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MUNICIPAL AFFAIRS.

A QUARTERLY MAGAZINE

DEVOTED TO

THE CONSIDERATION OF CITY PROBLEMS

FROM THE STANDPOINT OF THE

TAXPAYER AND CITIZEN.

VOLUME IV, 1900.

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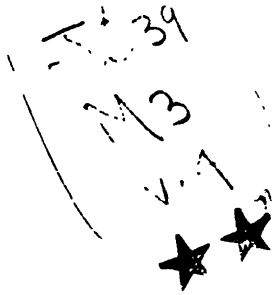

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PUBLIC OWNERSHIP AND THE SOCIAL CONSCIENCE.

BY R. FULTON CUTTING.

It is generally conceded that the commonwealth has a conscience, that the state is not a corporation without soul, but soul incorporated, and thus subject to "the pure and immutable laws of private morality." Yet in the administration of government, this principle is at the best but dimly visible and often fully obscured. Of course the stream cannot rise higher than its source, and the collective cannot be more sensitive than the individual conscience, but as a matter of fact it is disproportionately less so. Our executive officers do not represent the moral standard of the individuals who elect them, because they are deliberately chosen for other than moral qualities, although a vast majority of citizens will agree that if it is desirable to have a partisan executive, it is no less desirable that he should be as virtuous as they. But a really high moral standard is to-day a disqualification for office.

SPOILS CORRUPT THE PUBLIC CONSCIENCE.

It is this perversion of conscience in political life that is the grave indictment of the spoils system. We judge that system to-day by its economic results. We denounce the inefficiency of administration consequent upon appointment for partisanship rather than capacity, and we employ the civil service merit system as a rude method of counteracting its effects. But the real crime committed against society by the spoils system is moral not economic. It poisons our institutions at the fountainhead, corrupting the electorate and creating a political conscience antagonistic to

morals. To the spoilsman, politics is a remunerative profession not public service. For the fundamental principle of democratic philosophy—individual liberty to serve the state—, is substituted the proprietary theory—the exploitation of the state for individual profit. The district leader—the political kindergartner of the party—is a professional, whose emolument depends upon his success in corrupting youth by teaching it to regard obedience to the boss as a higher virtue than the service of the people.

Dr. Channing, writing in the bitterly partisan era of Van Buren's administration, says:

> Party spirit is singularly hostile to moral independence. A man, in proportion as he drinks it in, sees, hears and judges by the senses and understanding of his party. He surrenders the freedom of a man, the right of using and speaking his own mind. * * The triumph of his party becomes immeasurably dearer to him than the principle, true or false, which was the original ground of division. * * The conflict becomes a struggle, not for principle, but for power, for victory, and the desperateness and wickedness of such struggles is the great burden of history.

Now while the legitimate influence of political parties should tend rather to unity, the spoils system, in its last analysis, leads directly to disintegration. It is purely selfish, intensifying the proclivity to enrich one's self at the expense of others, and when "others" are so impersonal a quantity as the state, compunction is an unprofitable virtue. Yet our national history has demonstrated in many of its pages, that the American people are capable of unselfish action, and when the public heart is touched and real patriotism kindles, a true solidarity appears, majorities become overwhelming, the people obliterates the party.

The virtue is present, if it can only be enlightened. "The people," said Rousseau, "wishes its own good always, but does not always see it; the people is never corrupt, but it is often deceived, and it is then only that it seems to desire that which is evil." Can anything then be done to undeceive the people, to raise the public conscience to the standard of the individual? Civil service reform is only negative. It has done something to minimize the corrupting power of official spoils, but in the scope of administrative favoritism and in campaign funds, there still remains a vast reservoir for the thirsty spoilsman.

MUNICIPAL OWNERSHIP—A VIVIFYING FORCE.

In these last years of the nineteenth century, we have a new light upon the possibilities of the commonwealth. The theory of

municipal ownership of public utilities, now spreading so rapidly, is one of the longest strides yet taken by individuals who have associated to govern. It is now being studied almost entirely as an economic principle, and its advisability is advocated and contested by statistics. The main question that is asked is: Does it pay? There is, however, a moral principle embodied in municipal ownership, which, if permitted to assert itself and reach its logical expression, will soon dismiss the question of dollars and cents.

A serious weakness of our present economic system is that in the fear of suppressing individualism in business, we have largely stifled the consciousness of social obligation. "Greece," says Frederick Harrison, "taught us the noble lesson of individual liberty, but Rome, the nobler lesson of the sense of social duty." Democracy in its essence, is the harmonious blending of these two eternal principles, but until we give it a larger opportunity to embody itself in action, the social spirit will not assert itself, and its operation must be disappointing.

Now the municipalization of transportation and lighting in any large city, must inevitably bring its population into direct touch with the administration. A consciousness of personal relation is awakened. The subjective element of government, now obscured by our excessive solicitude for individualism, is brought to light. It is true the sentiment created is mainly selfish, but it is nevertheless educational. It may fairly be claimed that the selfish interests of passengers on the Brooklyn Bridge, made it, when operated by the municipalities of New York and Brooklyn, a well-managed and creditable affair, and practically prohibited the interference of the spoilsman. If the city's first essay in public transportation could so forcibly demonstrate the value of the principle, need there be any fear of extending its operation to the entire civic system, and at the same time increasing the direct participation in government by the vast army of the traveling public? The private interest that will protect the efficiency of the management of the various lines of travel is involuntarily public, and when to transportation the municipality adds lighting, the great body of citizens brought into intimate relation with the administration will absorb the private in the public interest.

THE SPOILSMAN OPPOSED TO MUNICIPALIZATION.

It may of course be urged that municipal ownership would enormously increase the number of city employees and so

strengthen a vicious administration, that it would play directly into the hands of the spoilsman, placing at his disposal a wealth of offices. Yet he does not embrace the opportunity with enthusiasm. He has not plunged into the tide and made himself the champion of a policy universally popular with wage earners. He is too clever. He no doubt finds the employees of great corporations enjoying public franchises already as loyal as he could wish, and it is much simpler to collect campaign assessments from private officials than from city employees. Indeed, one could hardly doubt that ownership by the city of its transportation facilities would palpably purify the political atmosphere. It would cripple rather than strengthen the partisan, and he scents danger in the proposition.

MORAL INFLUENCE OF MUNICIPAL ACTIVITY.

But the principle of municipal ownership leads to developments more far-reaching and morally instructive, and indicates a straight road to the ultimate enlightenment of the corporate conscience. To be permanent, this last of course must be preceded by the enlightenment of the individual conscience, but, at the same time, municipalization may effectually promote the process. This may be done by steadily broadening the scope of municipal activity until it shall embrace the functions of philanthropic service now performed by an infinite variety of voluntary organizations. When the people assume extensive and increasing philanthropic duties and responsibilities—functions of beneficence in which the financial is subordinated to the moral quality—, they will begin to apprehend the privilege of public service. The selfish interest in good government, appealed to by municipal ownership of the so-called public utilities, would be superseded by moral interest. The individual conscience, first aroused by an administration of positive virtue and progressive effort, would penetrate and permanently occupy the executive chamber. This, it may be said, would actually plunge our charities in politics. Our cherished and admirable voluntary institutions would be sacrificed to a political theory. It would certainly put them into politics. That, indeed, is the specific meaning of the proposition. Its purpose is to precipitate the opaque fluid of civic life by the infusion of a pure resolvent. This ideal cannot be instantly achieved, but if its realization were once made the serious aim of municipal development, a new patriotism would certainly appear.

In his work on *Municipal Government in Great Britain*, Dr. Albert Shaw says:

> I am strongly impressed with the belief that municipal reform proceeds haltingly in the United States, because for one reason, many citizens who desire sincerely to aid in the regeneration in their town life and neighborhood affairs, have formed no definite municipal ideals.

The spoilsman has his ideal; the party—its national importance, its glorious history, its solicitude for the wage earner, its recognition of faithful service. But his opponent is only negative; he is anti-Tammany, anti-Platt, with no positive platform, no progressive policy, no promise of continuance. The highest aspiration of many citizens is to secure an administration that will prevent corruption; to accomplish that end is to attain success. With a strange fatuity they believe such a government will re-create a citizenship and automatically perpetuate its own existence. Their effort exhausts itself in the hour of its triumph. "Reform" is indefinite, inadequate, and the word has lost its inspiration. What the age demands, and enthusiasm awaits, is Progress.

PUBLIC OWNERSHIP PRODUCES EFFICIENCY.

An English publicist, in a recent article, has declared that the dishonesty and inefficiency of American city governments makes it practically impossible for them to follow the example of British cities in pursuing the policy of public ownership. "First honesty; then larger business appears to be the proper order," is his conclusion. If our obstacle was the dishonesty of the electorate, his position would be sound and our condition desperate; but the problem is not the creation, it is the enlightenment of conscience. Mr. Croker's clever remark after the mayoralty campaign of 1897, "This is a great victory for the plain people," probably embodied the honest conviction of a large majority of his followers, nor have they yet learned to appreciate the barrenness of their victory. Their relation to government is remote, their relation to the party intimate. In the effort to transpose this relationship, the lever of public spirit will find its fulcrum in municipal ownership.

The condition of the English municipal governments before the Reform Act of 1835 was nearly as bad as ours to-day. The new democracies created by that measure had not time to develop the local boss before the rising tide of municipal activity commenced to awaken the social conscience. They were, moreover,

protected by the simplicity of the nominating provisions of the election code, which enabled the people to express themselves at the polls without the intervention of the partisan. At any rate, the fact can hardly be contested that the extraordinary efflorescence of the true civic spirit which to-day characterizes the cities of Great Britain is due to the operation of the public ownership policy. The corporations of Glasgow, Birmingham, Manchester and a host of other cities, have ceased to be mere passive spectators of the development of the community by individuals. They have become conscious of their own existence; have realized that the state was intended to be a vital entity, an active agent of beneficence, a positive factor in human progress. That the public spirit generated by this policy is fully equal to its responsibilities is best attested by the unstinted praise which Mr. Lecky bestows upon British municipal governments.

INFLUENCE OF MUNICIPAL CHARITIES.

But to discuss the latter part of the proposition more definitely. We have in New York—as in every city—a vast number of institutions, charitable and educational, supported by voluntary taxation of a generous few, and relieving the city of a large portion of the financial burden that should be assumed by all the citizens. The Children's Aid Society maintains free schools for the education of the children of the poor for whom the city makes no provision. It places the municipality under distinct obligation by voluntarily assuming part of its legitimate burden. The Kindergarten Society stands in the same relation. The Society for the Prevention of Cruelty to Children is really a bureau of the police department, and in its position of independence of both state and city authorities, is an absurdly undemocratic instrumentality of government. The great hospitals are also doing the city's work. The Association for Improving the Condition of the Poor, the Charity Organization Society, the United Hebrew Society, the Society of St. Vincent de Paul and many others are ministering to the city's poor, again conducting by private effort the specific work of the department of charities. Some of these institutions are measurably subsidized by the city. This may be government "of the people and for the people," but it is certainly not "by the people."

The process of learning how to govern "by the people" prob-

ably would have to commence with the economic side of civic life. The social spirit created by the realization of the selfish importance of good government when the city has assumed the functions of transportation and lighting, would doubtless then be equal to the assumption of the graver responsibilities of the purely moral functions of administration. Yet, in these too, the public touch with government would have to be maintained. The individual must be brought as far as possible into personal relation to the state, and the administration of the city's charities should be by boards and not by commissioners. This is, I believe, the true philosophy of the English system. They have exchanged the individual executive for a council more or less numerous, at the same time fixing the responsibility for the administration of the various departments of government upon the chairmen of sub-committees. As we have not this system, the principle should be employed by executive appointment of a board of hospitals, a board of institutions, a board of outdoor relief, etc., etc., composed like the board of education of unpaid citizens of public spirit. This would, moreover, enable the city to take advantage of the services of the most capable and devoted men and women among those who are giving their time and labor to the conduct of private institutions. It should not be difficult to get the best of our citizens to obey the call for such public service. Set them free from the serious burden of financing their institutions and give them the authority of the state to enhance the benefits of their judicious methods, and they will accomplish what is impossible to-day.

The weakness of voluntary charity in dealing with the complicated issues of poverty, is its practical powerlessness to enforce corrective measures. Kindness without authority is shorn of half its efficacy, and while it is true that the mere distribution of alms may be no charity at all, the ideal to be sought is found in a union of the personal element of the voluntary with the disciplinary element of the authoritative system. It may be said that the state has always failed in its effort to administer charity, and that the voluntary system is a great advance upon the governmental, and this is largely true; but the experiment has never been fairly tried under a democratic form of government, that is, a government "by the people." It is simply the refuge to which we are driven by the pseudo democracy of our time, and should be regarded as a merely temporary expedient pending the awakening of the social conscience.

In the German dual city of Elberfeld-Barmen, with a limited electorate, and under favorable conditions, the system is carried to its logical conclusion. There the electoral franchise carries with it the obligation of charitable service, and every citizen annually serves a term as a local visitor among the poor. With the complicated issues of our cosmopoliton population, this would be impracticable in New York, but with a strong central body, to be known, perhaps, as the Board for the Imrovement of the Condition of the People, and with affiliated committees in every ward, the system would be sufficiently democratized, and the people brought under the subjective influence of participation in the city's applied humanity.

The municipalization of private charities would involve a great additional expense. The millions contributed by the generous few would have to be provided from a general tax levy. The strictest economy in the use of the city's present income would hardly suffice to meet the new requirements; but there is nothing terrible in this. The citizens who now voluntarily support philanthropic institutions can fairly be claimed to represent the highest standard of intelligence and virtue in the community, and they virtually advocate a larger expenditure by it.

THE TEST OF EFFICIENT GOVERNMENT.

One of the gravest indictments presented by Mr. Lecky in his arraignment of democracy is that it is directly chargeable for the vast increase in local indebtedness that has taken place during the last half of this century. Unquestionably democracy is responsible for this phenomenon, and the fact constitutes one of its greatest claims to grateful recognition. No doubt civic officials have been incompetent, extravagant, dishonest, yet the net result of the spread of popular sovereignty is a vast system of public improvements and institutions that have transformed our cities, made them sanitary, clean and orderly, with an educated proletariat, a protected childhood, and an increasing provision for the disabilities of the poor.

But the theory of measuring the merits of government by its expenditures is sufficiently familiar to us at home. The tax rate is the sugar plum or club with which the electorate is cajoled or threatened. If it is high, the administration must be dismissed; if low, retained. We have but recently read of the governor of

this state warning certain legislators of his own party who were advocating the establishment of additional state institutions, that this was a presidential year, and the tax rate must be kept low. Of course the real question is the use or misuse of the fund obtained from taxation; and since with us, misuse has been so long the rule, it is not unnatural that the theory should tenaciously subsist. The people should persistently be taught to disassociate the tax rate and the administration's merits, and to fix their attention upon its achievements. With an honest and intelligent government, the greatness of the state is measured by the greatness of its expenditures. Reformers utterly miss the mark when they arraign the partisan for financial mismanagement. They may temporarily detach a few voters from the party, but they do not attach them to themselves. The ground of appeal is too material. The dollars and cents platform will never make true citizens. We have long heard it said that "municipal government is business, not politics." It is a misstatement, chilling and sordid, for municipal government is in truth morals, humanity, beneficence; it is the concrete expression of the communal religion, and it is only when the cause of progress is presented in such terms that we shall kindle a lasting enthusiasm for it.

THE TENDENCY OF THE AGE.

The older apprehension of the state that regarded it as a plastic compound to be molded solely by the individual, lacks the condition precedent to the birth of morals—life. The individual lives; the citizen dies. Public ownership will revive the latter; government will draw near; an electric spark will pass; the co-operative activities of the new citizenship will disclose a mutuality of interests, and mitigate the bitterness of class antagonism. In his *Reflections on the French Revolution*, Burke says, "The state is a partnership in all science, a partnership in all art, a partnership in every virtue and in all perfection." When to such partnership every citizen is actually admitted and the consciousness of his participation in government is pressed home upon him by constant and familar contact with its operations, and when the awakened corporate conscience is ennobled and invigorated by the broad philanthropy and social service of the commonwealth, democracy in America will justify the expectations of its most ardent advocates. Public ownership and greater municipal activ-

ity will surely come. New York cannot isolate herself by rejecting a policy that is every day gaining wider acceptation.

If we indorse the impotent conclusion, "First honesty : then larger business," we shall long defer the hour of our permanent emancipation from partisan domination. Slowly but surely public pressure will force upon our rulers a grudging acceptance of this policy, and they will reap the benefit, until at last the operation of the principle becomes sufficiently extended to regenerate the electorate. But this is the opportunity of the true civic spirit. The courageous adoption of the policy of public ownership as the definite ideal of political purpose, would appeal at once and powerfully to the people.

Moreover, the temporary advantage to be gained by a campaign upon this platform is the least of its virtues. It is because the policy promises to lay the foundation upon which to build a structure impregnable to the partisan, and to establish a new and direct relation between the government and the people, that it merits acceptance. The subjective element of government has been too long restrained, for while universal suffrage is philosophically its most profound expression, experience demands its more definite application.

SHALL AMERICAN CITIES MUNICIPALIZE?

VALUE OF FOREIGN EXPERIENCE AS A GUIDE.

By John G. Agar.

How far foreign experience in municipal ownership and operation of street railways and gas and electric light plants may be used as a means of determining the wisdom or folly of such a policy in the United States depends upon the similarity of municipal conditions at home and abroad. It is unnecessary, however, to consider other foreign countries than England and Germany, for they are representative of nearly every idea that obtains in foreign municipal administration, and they are the principal countries to which the advocate of municipalization goes for instances of successful operation by the city of public utilities. In applying this test one should examine municipal systems from the following points of view: (1) Franchise conditions—extent of suffrage; (2) Control by the central authorities; (3) The principle upon which the municipal administration, and especially the civil service, is founded. First, as to British conditions.

LIMITED SUFFRAGE IN ENGLAND.

The privilege of the municipal franchise has been extended with an almost even pace, until it is now bestowed upon all male and female householders who have lived within the municipal limits one year, have paid their rates (taxes) and received no relief from the authorities. It includes householders, lodgers who occupy quarters worth ten pounds a year, and owners of town property who reside within seven miles of the city limit. But as Dr. Shaw says:

> The English municipal electorate excludes in practice nearly all of the unmarried men, all floating laborers and lodging-house sleepers, and nearly all the serving class. Furthermore, in judging of the political effects of the extension of the franchise to the humblest householder, it must be borne in mind that the exploitation of the votes of the ignorant, vicious and indifferent in English cities by demagogues or party agents is so extremely difficult that it does not count for anything at all in

election results. * * In English towns, although registered by canvassers, they [the slums] do not care about voting, and are a neglected field so far as political missionary work goes.[1]

The result of the English suffrage laws is that the general character and intelligence of the voters is superior, and that the percentage of qualified voters is slightly less and of actual voters considerably less, than in the United States.

CENTRAL CONTROL RESTRICTS.

Again, in this country, the tendencies of universal manhood suffrage are almost entirely uncontrolled by a central authority; but in England, through central administrative control of the local governments, the effect of the general British franchise is not so far-reaching and inevitable. This control is not exercised through the appointment of officers by the central authority to exercise power granted by Parliament, but by giving the central authorities supervisory and restrictive powers over local officers —powers to be exercised to prevent unwise action on the part of the local authorities, to overcome their negligence and to secure their obedience to the law. All towns are organized under the provisions of the Municipal Corporations Act of 1882, which contains a general grant of powers with which practically no legislative interference is sought or permitted.

The branches in which this power has been exercised in England are the care of the poor, public health, public peace, public education and public finance, including the auditing of the accounts of local authorities. The agents of the central government through whom these powers are exercised are the Local Government Board, the Treasury, and the Home Office.

The proper administration of these departments of city government is of no less importance to the nation than to the locality, and the effect has been stated by Dr. Maltbie as follows:[2]

The frank recognition in the recent English legislation that the State as a whole has a vital interest in the performance by the local authorities of many of the functions of government entrusted to them, and the subjection of such functions of government to central administrative supervision, have been among the causes which have transformed English social and political conditions during the present century. The marked improvement in English local government, and the great increase in its efficiency have been secured also without an undue centralization, and without diminishing local public spirit. * * The result has been to reduce legislative interference in local gov-

[1] *Municipal Government in Great Britain*, p. 45.

[2] Goodnow, *Municipal Problems*, chapter VI, by Maltbie.

ernment to a minimum, to increase enormously the efficiency of local government and by clearly differentiating the state agency of cities from their sphere of action as local organizations, to open the way for a greater extension of municipal activity.

Dr. Shaw says :[1]

The system works in the interest of justice and its costliness in money and in time is counterbalanced by the benefits which accrue from the more thorough preliminary shifting that every scheme receives in preparation for the searching ordeal at Westminster, and from the valuable emendations which so often result from the advice that expert central officials can give.

HIGH EFFICIENCY OF BRITISH OFFICIALS.

In England, members of the town government are held in high esteem. Indeed, it is said that the town councillors occupy a position next in honor to members of Parliament. Councillors are generally men of character and of intelligence and represent the best elements of the business community. No salaries attach to the position, and once in the council, a member may if efficient rely upon remaining in office as long as he is willing to serve. The council have questions of the most serious and pressing nature to provide for, and generally there are a large number of prominent and able men ready to join its membership. There is little to attract men of unworthy motives. There are few opportunities for jobbery, and the council as a body has an undivided authority in the sphere over which it is placed. Its members are held strictly responsible for all matters within its authority, and when the constituency find fault with the conduct of government, there is no obscurity as to where the blame is to be placed. The mayor is designated by the council for one year, his duty being simply that of presiding officer. There is a standing committee for each important branch of the municipal service, and this committee selects a prominent expert chief of the department who organizes it in detail and superintends its operation. Thus, besides the permanent staff of high officials, such as the town clerk, the borough engineer and the medical health officer, there is a superintendent of water supply, a chief of police, and various other administrative officers.

All officers of the municipal government are chosen on their individual merit, and on their capacity to perform the work which they may be called upon to do. They are not measured by party standards and chosen because they have done good service to either

[1] Shaw, *Municipal Government in Great Britain*, p. 68.

national party, or because they can control or deliver an ascertainable number of votes. Rotation in office as a party principle or practice is not known, and the only recognized reason why a man once in office is retired is inefficiency or old age. His fitness for the work is the supreme quality sought, and once obtained is carefully guarded and not cast away at the demand of a more favored party adherent.

The general conception of government in an English municipality is that it should perform all of its functions to the best interest of the inhabitants. And those functions are becoming more extensive just in proportion to the ability of the municipality to perform them efficiently.

GERMAN ELECTION SYSTEMS.

As to Germany, all authorities unite in the statement that there are no limits whatever to the national conception of municipal functions. And a brief survey of the equipment of a municipality will prove that all are fully organized to do their work properly. The different states of Germany have their distinct municipal systems with many variations in detail, but the systems in the principal states are essentially similar. The municipalities are recognized as units of government, with their own properties and functions, and with the right of entire self-government within the sphere of their local affairs, under general laws.

In order to appreciate the German municipal system of government, one must fully understand their electoral system. The voters in Prussia are those who pay certain kinds of taxes above a minimum amount, and the restrictions exclude ten or fifteen per cent of the men of voting age. The city is divided into a number of electoral districts. Voters are listed in the order of the sums they pay for direct taxes, and divided into three classes, each of which has paid an equal amount, and each of which has equal power in elections. The first class is composed of the group of heaviest taxpayers whose payment of direct taxes aggregate one-third of the amount of direct taxes paid; the second comprises the next largest number contributing one-third of the aggregate amount; and the third class comprises the mass of small taxpayers and those not owning property who are allowed to vote. Each class in a given district elects a member of the town council. In some parts of the German Empire, the class system is

not maintained, although considerable restrictions upon the franchise are everywhere developed.

In Berlin in 1898, there were registered as qualified voters 308,692 men, of whom 1,216 were in the first class, 8,865 in the second, and 298,611 in the third. Each class chose its third of the municipal council regardless of the number of voters therein. An extreme instance of the preponderance which this system gives to wealth and conservatism and in the main to intelligence, is that of the manufacturing city of Essen, where, in a population of nearly 100,000, there is a mere handful of persons who pay one-third of all the taxes, and who are therefore empowered to designate one-third of the councillors. The statistics show that at one election, one voter appeared for the first class and counted for as much as nearly 2,000 men who appeared for the second class.

Mr. Brooks in his article on *Prussian Municipal Elections*, says :[1]

> In favor of the three-class system it may be said that it generally brings men of ability, influence and business standing into city councils. Very frequently members of the first class of voters who possess what amounts to an appointive power, instead of using it to put themselves or their subordinates into office, seek out leaders of the professional and intellectual life of the community and confer upon them seats in the city council which men of this stamp would hardly be willing to enter into a political contest in the third class to obtain. A large part of the ability with which the financial affairs of Prussian cities are managed must be ascribed to the dominance of the taxpayers' influence in municipal government. City councillors know whose money they are spending and realize that the power of the purse is absolute over them. The most careful economy is practiced in every branch of municipal administration and the civic spirit of individuals is utilized in a great number of unsalaried offices. Municipal virtues of this sort the three-class system has in abundant measure.

EFFICIENT MUNICIPAL SERVICE.

The object of the majority of voters in German cities appears to be the selection of a good municipal council. Everything revolves around this central body. It elects the burgomaster, designates his expert associates of the magisterial staff, supplies the means of carrying on the city government, and represents in its own enlightenment, ability and aspirations, the standard and character of the community's progress.

Municipal councillors are as a rule good citizens. It is considered a high honor to be elected to the council. Membership is a title of dignity which merchants, professional men and scholars

[1] MUNICIPAL AFFAIRS, III: 422.

are usually eager to hold. No salaries are paid. The re-election of good councilmen term after term is common and expected. The sentiment towards the position is much the same in Germany as in Great Britain, though stronger with men of high education in Germany. Men eminent for scientific, economic and other expert knowledge are always present.

The magistrates are a body of distinguished, honored and highly paid professional expert employees. The professional civil service is even a greater and better field of employment in Germany than in England. The mayor of a German city is a civil servant, the permanent head of a permanent body of trained officials. It is perfectly understood that they shall be re-appointed when their term of office expires, and their tenure is practically for life unless they forfeit their position by their own misconduct. In a word, the theory of the German system of city government is to place the wisest and best citizens in positions where their knowledge and their abilities may be productive of the best results to the city, and to place them there because they are best qualified to perform the duties of their offices.

The efficiency of German city governments in the prosecution of public works is due to this perfect and continuous organization of the executive administration. The burgomaster is practically a life incumbent, and the magistrates who conduct the various departments either hold their places by life tenure or upon long terms which are renewed as long as efficiency lasts. The city council hold office for long terms and re-elections are so usual that the personnel of the body is transformed very slowly. Consequently, it is possible to make long plans, to proceed without haste, to distribute burdens through periods of years, to consult minute economies, and to make an even, symmetrical progress. If a German city decides to have well paved streets and to modernize its whole thoroughfare system, it proceeds systematically to learn everything that can possibly be known about street making, and the department does not move until every detail of the problem from the engineering and the financiering standpoint has been thoroughly worked out. The history of German municipal improvement during the last twenty-five years is a direct result of the application of these principles, and could have been accomplished in no other way.

CENTRAL SUPERVISION.

In Germany the central administrative control exists in a greater degree than in Great Britain. The old idea that cities were a part of the central government shows much virility, and is especially evidenced by the instances in which the central state administration may veto the choice by city councils of their most important executive officers and dissolve the councils themselves. The central authorities may, when the local authorities neglect or refuse to do so, insert in the budget of the city appropriations which the law requires to be made, and may make provision for levying taxes to provide the necessary funds.

In certain cities, the central administrative authorities also have the supervisory care of the police, including not only the preservation of the peace but the care of the public health and the prevention and extinguishment of fires. In other cities, the central administration has power to take entire charge of the police itself by appointing persons who are to supervise and perform the work. In all these cases, it is distinctly recognized that the city is acting as agent of the central government and as such it is subjected to the regular, rigid and undeviating central administrative control exercised over all branches of governmental activity in the country at large. The fact that they are attended to by the city does not alter their character. While the cities are given certain discretionary powers relative to these matters and many of a supplementary character, the central administration does not lose its power to insist upon taking a certain minimum of action to secure wise and proper action by the municipality.

The extent of the central administrative control appears very strongly in school administration. The general system of instruction is, as a rule, prescribed by the central authority. The city school board supervises the details of school management, but consists partly of members appointed by the central administration and partly of members appointed by the local councils. The town council generally appoints all teachers and regulates school finances subject to the control of the central administration.

The central administration also has and exercises extensive powers over the local bodies in all matters in which the State as a state has an interest, and especially in questions of finance.

In general the central administrative authority is used for the purpose of keeping the city within the bounds of its com-

petence as fixed by law, of forcing it to perform its duties as agent of the state, and in preventing the city from acting unwisely in purely municipal matters.

BRITISH AND GERMAN SYSTEMS SUMMARIZED.

Thus, we see that the English and German cities are organized under a general law, upon general principles, with a minimum of legislative centralization or interference, and a maximum of administrative decentralization or power of self-government. We find that while the central government has released largely to the localities the management of purely local affairs, it retains the right to supervise the administration of those affairs, especially those in which the municipality is acting as agent, by direct interference in some cases and by advice and veto in other cases; and thereby assures for the municipality not only the most painstaking scrutiny, but the most advanced information which the progress of the arts affords.

We find generally the only elective body to be a council, while the citizens qualified to vote for it are property holders; and in Germany the property holders of the first and second class have a preponderating amount of power, whence the principle can be announced that the majority of those who vote the taxes are interested primarily by reason of their having property to be taxed.

We find a class of civil servants trained for the profession of municipal administration in all of its details, educated for its pursuit, inspired by its aims and praiseworthy opportunities, and rewarded by the accomplishment of the public good and the honorable regard of their fellow citizens. And above all, we find an organization designed in its details to carry on a large business with the least friction between its parts. From the members of the council, the mayor, burgomaster, heads of committees and paid heads of departments, to the day laborer, we find a machine in which each part is selected because of its fitness to accomplish the end in view.

These are the conditions which exist in the countries where municipal ownership and operation have been carried on to the greatest extent and with the best results. It is not surprising that under such circumstances such enterprises have been successful. It is not part of this discussion to consider whether private operation would not have accomplished equally beneficial results for the

community, nor to point out that in England there are signs that municipal ownership and operation are developing weakness when attempt is made to apply them on a scale commensurate with the demands of a large section of the country as distinguished from the demands of isolated communities.

AMERICAN CONDITIONS CONTRASTED.

When we turn to the municipal conditions which exist in this country and inquire whether it is probable that they would produce like results if the operation of the public utilities mentioned above were intrusted to municipalities organized as ours are, we find ample reasons to advise caution before students of municipal affairs array themselves as advisers of experiments so bold. It must be observed that the present state of effort at municipal operation in this country is too undeveloped to permit of the argument of experience from like causes. Therefore, the only sound method of reasoning is to study the causes which have produced certain results abroad, and if we find them essentially different from the forces operating in this country, we must discard them as premises or precedents.

In a curious book, entitled, *Domestic Manners of the Americans*, written by Mrs. Trollope in 1832 after an unusual experience in this country of more than three years, the author observes:

> While by describing faithfully the daily aspect of ordinary life, she has endeavored to show how greatly the advantage is on the side of those who are governed by the few, instead of the many. The chief object she has had in view is to encourage her countrymen to hold fast by a constitution that insures all the blessings which flow from established habits, and solid principles. If they forego these, they will incur the fearful risk of breaking up their repose by introducing the jarring tumult and universal degradation which invariably follows the wild scheme of placing all the power of the state in the hands of the populace.

Although this gentle English critic meant to refer to the general government of the United States and its consequences, she in reality pointed to the municipal conditions which were visible to her keen but unskilled eyes. Who can say she was incorrect then? And who can deny that there exists to-day a "jarring tumult and universal degradation" in many, if not most or all, of our large cities.

In contrasting the habits and principles of our large municipalities with those of England and Germany, we find the differences many and profound. In most cases manhood suffrage has

placed the balance of power in that portion of the population which has least ability to use it and least interest in its proper exercise. Although the conservation of life and liberty are of more importance in political society than the protection of rights of property, those who have a claim to both are more interested in good government, more conservative, generally more intelligent, and therefore the best governors of any locality.

Further, the grant of manhood suffrage is more radical in this country than an equivalent right would be in either England or Germany. There, the population is more stable. If new elements come in they have national traits and habits and aspirations and prejudices, as they almost invariably come from different parts of the *same* country. Here, in our seaboard cities especially and in other cities also, the vast influx of foreign heterogenous and unmixable elements fill the ranks of our people with units of different habits, prejudices and aspirations. There, they have the conservatism and the pride of home. Here, they lack for many years both conservatism and the pride of place, and fall an easy prey to the designs of those intent upon using them for their own ends.

Again, in our municipalities there is little power in any part of the government to conduct their affairs without continuous and continual interference from the state legislature. The goverment is not local government but really state government of localities with some little local autonomy vested in the mayor, council and heads of various departments. The state interferes through an agency least fitted by its constitution for administrative work, and not at all fitted to correct or assist municipal efforts towards progress. In fact central administrative control exists only to a very slight extent in this country. It is subordinated to legislative interference.

The result is that our municipalities are not organizations adapted to carry on any business properly. The powers which they possess are too narrowed by legislative limitations, or if perchance they be endowed with ample powers, the officials who possess them are as a rule disqualified by want of technical training or moral habit from exercising them for the best benefit of the community. There is no skilled body of municipal officers, no corps picked out to work for the community because they are the most apt citizens which can be found and because they are inspired by local pride and the desire of an honorable name.

The municipal governments of this country are still suffering from adoration of the false god of the federal constitution. That instrument was designed by the fathers rather to prevent events from happening than to accomplish narrow definite results. They were frightened by the danger of absolutism in the general government and so wrought as to make that impossible. There is no plan more ill devised to secure efficient, economical and progressive management of positive and limited forces, such as exist in every urban community, than this instrument. The problems of the general government are largely questions of policy. Those of the cities of management.

So it comes to pass that we find our municipal machines ill fitted to assume new burdens, whether we consider them in their own constitutions or by comparison with those organizations abroad which have had successful experience in owning and operating the businesses most necessary for municipal happiness. Our cities are in a state of political ferment, and it may be of progress, at present. When the outcome of all the unselfish thought and labor now being bestowed on the subject of administrative reform is a scheme of municipal organization capable of administering our cities with efficiency and economy, then it will be time to bestow upon that organization the powers which are needed to keep the municipal house up to the highest standard. But that time has not come.

Meanwhile, the plan which seems to conserve the interests of the community best by insuring ample returns for public franchises and which seems to secure the application of the best ability of the land to any given problem, is the system of short term leases of public utilities. This also is the safest and most practicable means of reserving for the people the remainder of any valuable enterprise which the future may develop; and it is the quickest and easiest way to obtaining large revenues without borrowing. The system of public ownership and operation in this country and at this time would certainly generate fraud in the procurement of labor and materials; would bring to the front ignorance, negligence and corruption in management; would give undue scope to party politics, more frequent opportunity for change of employees for corrupt purposes, and less opportunity to secure efficient service at reasonable rates; all to the end that the spoils system would be vastly strengthened and the people longer kept apart from their own.

MUNICIPAL TELEPHONES IN AMSTERDAM.

By Ph. Falkenburg and J. H. van Zanten.

[Note.—To Mr. Y. S. Theunissen, the eminent director of the municipal telephones, are due many thanks for his kind aid and valuable assistance.]

Municipal or government operation of the so-called public service industries has not been very much desired in the Netherlands until within the last few years; only gas works and water works have been operated by the municipalities for now thirty years in several Dutch cities. It is not strange, therefore, that when the telephone was invented, no city directly thought of undertaking the operation of a system.[1] Thus the International Bell Telephone Company (limited) received from many cities the franchise to establish a telephone system.

On the 20th of April, 1880, this company submitted an offer to the municipality of Amsterdam in which they offered to pay to the municipality 21½ per cent of the gross receipts. Thereupon, by a resolution of the municipal council of September 7, 1880, the company was granted the exclusive right, for a period of fifteen years, to erect and use in the municipality telephonic conductors intended for public use and to support the same on municipal property. On the 8th of December, 1880, the company indicated their wish to accept the concession, but desired to transfer the franchise to the Netherlands Bell Telephone Company, a privilege which was granted.

CONDITIONS LEADING TO MUNICIPALIZATION.

When the period of this concession had expired, the use of the telephone for communication had developed in a way not expected at the beginning. It had become the means of intercommunal and international communication. The franchise for

[1] See A. R. Bennet, *The Telephone Systems of the Continent of Europe*, for a history of telephones in the Netherlands.

the operation of the intercommunal telephone had of necessity to be granted by the government; and this also was conferred on the Netherlands Bell Telephone Company. In the year 1894 the government introduced a law to transfer to itself the intercommunal system. A petition of the Amsterdam municipal council to the government to include the Amsterdam telephone system in the government system produced no results; and the municipal council therefore resolved on December 12, 1894, not to renew the concession, to allow private operation no longer, but to establish an entirely new municipal system.

The causes which led to this resolution were: first, that the development of telephonic communication had not kept pace with modern advances (the number of telephones on January 1, 1895, was only 1,752, not four per 1,000 inhabitants); secondly, the equipment was entirely out of date, and the concessionary was not inclined to make any large outlay for improvements; and finally, the subscription rates were too high, and the concessionary refused to reduce them.

Because of the many discussions in the town council, the resolution was adopted so late that the new system could not be completed by September, 1895; and since the Netherlands Bell Telephone Company was not willing to sell its conductors to the municipality, with which the latter could have commenced operation on September 7, 1895, the municipality permitted the company to exercise its privileges until the first of November, 1896, without being obligated to any payment to the city. On the latter date (Nov. 1, 1896), the municipality began operations.

In the meantime, the municipality had to overcome still another difficulty. A statute of the year 1852 made every private telegraph undertaking dependent on a franchise from the government. The government wished to apply this law to telephone undertakings also, but the Amsterdam municipal council did not accept this interpretation. After long discussion, however, it felt itself compelled to secure a government concession (which it did on April 20, 1896), lest later the city should be shut out from intercommunal and international telephone communication. On the 1st of November, 1897, the intercommunal system came into the hands of the government; and here also the Bell Telephone Company had to lay down the work. The example of Amsterdam was in the meantime followed by several cities. It is not improb-

able that later the central government may assume the entire telephone business in Holland.

If now we compare the conditions in Amsterdam before the year 1896 with those after this year, we can observe the following results:

IMPROVED SERVICE.

The telephone equipment has been much improved by the municipality. The Bell Telephone Company at first used without exception aerial single conductors of bronze wire covered with gutta percha,—but since the year 1892 had placed several conductors underground, so that on October 31, 1896, they had 13,900 metres of underground cables, with 566,181 metres of wire. The central exchange was equipped with a primitive standard system.

The municipal telephone is modern throughout. The equipment is erected on the principle of using above-ground conductors as little as possible and of leading a double conductor into the house of each subscriber. On the first of January, 1899, the length of the cable net was 137,635 metres of ground cables of 28 double wires, 4,684 metres of ground cables of 56 double wires, 2,243 metres of "water cables" (cables laid through the canals), 28,654 metres of 14 double wires, and 973 metres of water cable of 1 double wire,—altogether 4,189,017 metres of double wire, or 8,378,034 metres of single wire—an increase in two years and two months of 1380 per cent, or nearly fourteen fold. Work is now being pushed in placing more of the above-ground conductors, which are of bronze wire, in underground conduits. There is only one central exchange, which is equipped with the horizontal multiplex system, having a capacity of 10,800 subscribers.

LOWER RATES.

The rates have been reduced by the municipality. The yearly subscription price under the Bell Telephone Company was 118 fl. ($47.20), the cost of the apparatus and of making the connections being included. At the outset, the burgomaster and aldermen proposed a subscription price of 75 florins ($30), which entitled the subscriber to 800 calls yearly; for each 100 calls in addition up to 10,000, 1.50 florins ($.60), and for each additional 100 calls 1 florin ($.40) should be paid. Strong opposition was raised on all sides to this tariff and especially by the tradesmen, with the result that

the council established a fixed price of 90 fl. ($36) for unlimited service, with a single installation payment of 25 fl. ($10.) Hotels and other buildings open to the public pay 115 fl. ($46.) A single call from a public telephone costs 0.25 fl. (10 cents.) Since no successful device has yet been applied for automatically counting the calls, no proposition has so far been advanced for a further reduction of the subscription price.

This reduction means more than the mere statistics indicate, for with every increase in the number of subscribers and improvement of service, telephonic communication becomes more valuable as it can be used much more frequently and with one fixed price costs no more. Thus, the benefit is still greater than it at first seems.

INCREASED USE.

The more rapid increase in the number of subscribers, since municipal operation began, is shown in the following table. The numbers on the 1st of January were:

	Year.	Total Number.	Per 1,000 Population.
Bell Telephone Co.	1882	612	1.8
	1883	853	2.4
	1884	1,057	2.9
	1885	1,148	3.1
	1886	1,217	3.3
	1887	1,263	3.3
	1888	1,313	3.4
	1889	1,435	3.6
	1890	1,515	3.7
	1891	1,523	3.7
	1892	1,551	3.7
	1893	1,629	3.7
	1894	1,689	3.8
	1895	1,752	3.9
	1896	1,784	3.9
Municipal operation,			
Nov. 1,	1896	130	—
Jan. 1,	1897	1,796	3.8
"	1898	2,143	4.3
"	1899	2,544	5.0
"	1900	3,031	5.8

The number of calls has likewise increased, which also shows how favorably the new administration is viewed. They have amounted to:

	Year.	Total Number.	Average Number of Calls per Subscriber.	
Bell Telephone Co.	1883	2,006,539	2,352	
	1884	1,245,793	1,178	
	1886	1,110,368	912	
	1887	1,167,017	924	
	1888	1,825,000	1,390	
	1889	2,920,000	2,035	
	1896	3,650,000	2,046	
				Maximum per Day.
Municipal operation,	1897	3,916,450	2,181	12,938
	1898	4,769,100	2,225	15,920
	1899	5,651,200	2,221	20,714

It is well to notice also that the number of calls per subscriber has not greatly increased under municipal operation, which reflects the fact that a larger number of the small shop-keepers are introducing telephones—a factor of great importance and an effect of municipal operation.

The number of intercommunal and international calls has also increased continuously. The number of intercommunal calls amounted to :

	Year.	From Amsterdam.	To Amsterdam.
Bell Telephone Co.	1891	25,923	25,400
	1892	28,926	28,961
	1893	30,285	31,110
	1894	33,643	?
	1895	39,193	?
	1896	43,038	43,528
Government operation,	1897	55,714	60,540
	1898	104,684	112,815
	1899	149,702	150,262

The number of international calls was :

	From Amsterdam to		To Amsterdam from	
	Belgium.	Germany.	Belgium.	Germany.
1897	2,248	1,232	2,052	1,446
1898	2,683	1,346	2,325	1,563
1899	2,897	2,132	3,573	2,983

Municipal operation has also brought about two other improvements by which it may be distinguished from private operation and to which we must give some attention. In the first place the latter had only a day service and was closed during the night, while the municipal system is in operation *day and night.* The night service includes the time between 10 o'clock in the evening and 8 o'clock in the morning; and in the year 1899, there was

during this period an average of 344 calls and a maximum of 466 calls per night.

BETTER PAID EMPLOYEES.

Another improvement concerns the working hours and the compensation of the employees. The employees of the company worked nine hours a day for a maximum weekly wage of 6 florins ($2.40). Under the municipal system, the working period is only seven hours. There are telephonists of the first class with a weekly wage of 8 to 10 florins ($3.20 to $4.00); of the second class with a wage of 5 to 7 florins ($2.00 to $2.80); and apprentices with a wage of 2 florins ($1.20). Those who have not reached the maximum salary receive every year an increase of 1 florin ($.40).

In the case of sickness, the employees of the technical service receive three-fourths of the latest wages for a period of three months; after this period, one-half pay. The employees of the administrative service receive in case of sickness the full salary. In case of accidents full wages are paid to all employees; and after a service of thirty years, a pension is secured equal to one-half the salary or wages. In case of earlier invalidity, a pension amounting to one-sixtieth of the salary or wages for each year of service is granted.

FINANCE.

Concerning the financial condition of the telephone system, we can present the following: Of the financial results of the Bell Telephone Company, nothing further is known than the yearly payment to the municipality. This amounted to, in the year:

1882.....	$6,532.76	1889.....	$14,292.33
1883.....	9,454.32	1890.....	15,101.22
1884.....	10,726.48	1891.....	15,482.24
1885.....	11,655.29	1892.....	15,838.84
1886.....	12,298.92	1893.....	16,479.58
1887.....	12,836.42	1894.....	17,125.42
1888.....	13,460.54	1895 to Sept. 1.	12,301.24

The municipal telephone began with a sum from the municipal treasury of $200,000, of which almost $44,000 was needed for the building for the central exchange. On the 16th of January, 1899, the total capital expenditure was $490,000, of which $400,000 more or less had been paid from loans.

The revenue of the telephone system amounted, in the year 1897, to $79,982.98; and in the year 1898 to $95,966.09. The cost of operation amounted to:

		1897.	1898.
A.	Salaries and assessments for old age pensions	$13,483.81	$18,477.46
B.	Maintenance of buildings and equipment	6,172.58	7,039.00
C.	Office expenses	401.50	535.44
D.	Electric current	696.00	836.71
E.	Sundry	2,959.83	2,685.05
	Total	$23,713.72	$29,573.66
	The gross surplus was expended in the following manner :		
	Interest on loan capital	$11,241.03	$11,825.82
	Redemption of loan capital	12,186.18	15,897.94
	Payment to the municipal treasury	20,000.00	20,000.00
	Total	$43,427.21	$47,723.76

The net profit, which was used for extensions, thus keeping down bonded indebtedness, was in 1897 $12,842.05 and in 1898 $18,668.67.

Thus at the outset the taxpayers receive no great direct advantage from municipal operation, since the payment which the municipality received from the Bell Telephone Company, amounting during the last year to $17,000, has been increased to $20,000 and stereotyped at that amount. When the capital is redeemed,—and this will be accomplished in a short time,—the situation will naturally be changed ; but it must not be overlooked that each new addition to the existing net costs considerable capital, and more proportionately the further it extends from the central exchange. This cost will also be added to if the subscribers increase to over 3,600 ; since at present a switch-board for 3,600 subscribers is used. Should the number increase to 10,800 (which so soon as the fees are reduced will not be long delayed) the entire central exchange must be rearranged, or the system of a single exchange must be abandoned.

Thus, the municipal telephone in Amsterdam is a successful example of municipalization of great public undertakings, an example of profound significance, especially in a municipality which ten years before possessed no single large monopolistic undertaking, and now may point with pride to the gas works, the water-works, an abbattoir, a telephone system, a clothing factory for the uniforms of municipal employees, a horse-railroad presently to become an electric railroad, and two steam ferries,—all of which have been managed with good results.

STREET RAILWAYS IN BRITISH TOWNS

MUNICIPAL SYSTEMS COMPARED WITH COMPANY ENTERPRISES.

By Robert Donald.

Tramways or street railways in British towns are just now in a transition stage. We are passing through various phases of development and trying to make up for lost time. There is unprecedented activity on the part of municipalities, and private companies are making their last stand in this field of enterprise. Street railways in most of the large cities are rapidly passing into the hands of the municipal authorities, who intend to operate the systems as well as own them, while electric traction is being introduced with every transfer and in connection with every new undertaking. The whole system of transportation in cities is therefore undergoing a great transformation.

British towns have been behind American and continental cities in the adoption of electric traction, for causes which are not altogether without some compensating advantages, as will be seen. We are now profiting by the experience of other places and following the best examples. The developments now taking place are of three kinds.

MUNICIPAL STREET RAILWAYS FAVORED.

After tramways were first introduced into England by George Francis Train, and many experiments undertaken, it began to look as if the new means of transportation had come to stay, the House of Commons said: "There are the elements of a new vested interest here, we must stop it." Then acting on the sound principle that the streets of a city are the property of the citizens and should not be used for private, profit-making purposes, except with the consent of the citizens and under the conditions which they impose, the House of Commons devised means to make the municipality supreme. To begin with, the municipal councils were given power to lay down the rails themselves, or to come to terms

with companies for doing so. No tramway undertaking could be established without the consent of the municipalities, and if they gave their franchise away, they had only themselves to blame. As a matter of fact, few franchises were given up outside London, without an annual payment, and London, owing to its primitive system of municipal government, became in this matter as in others the easy prey of private interests. In some cases the municipalities constructed the tramways and leased them on terms which enabled them to pay off the whole of the original capital in a little over twenty years. Public interests were most effectively safeguarded, whether the towns built the lines or allowed companies to do so. No town could barter away its municipal birthright.

It is hardly necessary to describe all the stringent provisions of the Tramways Act. The crucial clause was that which compelled the companies to sell their undertakings to the municipal authorities at the end of twenty-one years "at the then value," without any regard to good will, past or prospective profits. That is to say, the municipalities were empowered to buy up the street railways after twenty-one years at the price of old metal; and that is what they have been doing within the last few years as the tramways constructed in the early seventies have reached the purchase age. Cities like Glasgow and Manchester, which built their own tramways, had nothing to purchase and simply succeeded to the system when the lease of the companies which worked them expired. During the period of the lease the companies have almost invariably paid a rental sufficient to maintain the lines, pay interest on the capital and redeem most of it.

The House of Commons, when it passed this Act, also adopted a standing order which prohibited any public authority from operating tramways itself, and this bar to municipal progress was not removed until 1896.[1]

The explanation of the present activity in municipal tramways is due therefore to three causes:

1. The transfer of tramways on the expiration of leases.
2. New power for municipal working.
3. The introduction of electric traction, the advantages of

[1] Huddersfield Corporation has operated its tramways since 1882 but under license from the Board of Trade and only in default of any company submitting a tender to work them. In the case of Glasgow, a clause in the Glasgow Tramway Company's Act enabled the Corporation of that city to transfer the powers of working, but this was the only case of the kind. See page 41.

which municipalities wish to secure for each community and not for shareholders who may be spread all over the country.

LIGHT RAILWAYS.

Another phase of the present transformation is the construction of light railways. The Light Railways Act of 1896 was intended to enable county councils, and other municipal authorities or private companies, to construct a light kind of railway in suburban districts and sparsely populated places. The chief object was to help agriculture by enabling farmers to send their produce to markets cheaper than by the ordinary railroads. The Act does not involve expensive procedure. The approval of three commissioners and the Board of Trade, after an inquiry has been held, is sufficient sanction. There is no bill to promote and inexpensive construction is permitted. Light railways were not, in fact, expected to be very remunerative undertakings, and there are no clauses in the Act regulating working, leasing or purchase. Private companies soon discovered this loophole which enables them, in some cases, to build tramways under the Act and therefore get rid of municipal control. They are very active just now in carrying out light railway schemes in small towns, from one town to another, and through them both, and the municipal authorities have not been smart enough to stop them except in a few cases. Nearly all these light railways will have electric traction. No doubt some of them will have to be bought at heavy cost by municipalities in the future.

UNDERGROUND ELECTRIC RAILWAYS.

The only contribution which England has made to new transportation facilities during recent years has been in underground electric railways, six of which are now being constructed or are planned in London. These are not ordinary subways. They are from 60 to 100 feet below the surface. Each pair of rails is in a separate tunnel and at some points eight of these tunnels will meet, forming a great subterranean junction. Passengers are carried up and down in huge elevators. This is a system of transportation which electric traction has rendered possible.

A TEMPORARY CHECK TO ENTERPRISE.

It will be well to admit frankly that the provisions of the Tramways Act of 1870 put a check on enterprise. The prospects

of profit were not attractive enough. Few tramway companies have earned a return of six or seven per cent. The average has been about three or four per cent; none of them wrote down the value of the undertakings sufficiently to prepare for extinction without loss in twenty-one years' time. In the latter part of their twenty-one years' lease of life, their only object was to reduce their capital expenditure and increase their profit. They allowed their plant and rolling stock to get out of date and could not under the circumstances be expected to introduce electric traction. That is the chief explanation why Americans find street railways out of date in British cities.

There are many compensating advantages, however, and it will be better for the people in the future that no vested interest in street railways was allowed to be created. The towns have maintained absolute control over their streets. In continental cities, street railways have obtained long concessions for monopolies. In America, franchises have in many cases been given up, and street railway companies have enormous power and wealth. They can always exercise a corrupt influence at election times, if they are seeking some new concession, and they will always try to subborn officials. They will look to their own interests first.

BENEFITS OF MUNICIPAL OWNERSHIP.

The advantages of municipal ownership, even when it does not involve working, are considerable. The municipality in leasing its lines at a yearly rental imposes terms; it regulates fares; provides for workingmen's cars and fair treatment for employees. This has been admirably illustrated in the case of the London County Council and the North Metropolitan Tramways Company. The council acquired this company's system under the Act of 1892, but gave it a new lease until 1910. Under the old conditions, the company paid no franchise and was under no control. It went on comfortably paying itself ten per cent or more, but making no effort to improve its system or study the public. Under the new conditions, the company pays the council $225,000 a year and 12½ per cent of the increase in its receipts. It must set aside $180,000 a year to maintain and reconstruct the lines. Fares must not be raised, and workingmen's trams at low fares must be run up to eight A.M. The hours and wages of the employees must not fall below the best treatment of the employees on any company's sys-

tem in London. The company must recognize trade unions and has been fined because it dismissed some employees on the ground that they were members of a union.

The company has been making more progress under these conditions than ever before. It studies the needs of the traveling public, lowers its fares and issues return tickets which are available on any day by any car and in any direction. The result is that its profit has not decreased but has increased.

The full fruits of municipalization will only be obtained, however, until the city councils operate the lines as well as own them. Every example of municipal working has been followed with success. Looking to the future, I should say that the object of municipal tramways will not be to earn large profits, but to carry people at cheap rates, and that system will be considered the most successful which carries the greatest possible number of people at the lowest possible fares. Street railway fares are lower in British cities, where the municipal ownership prevails, than in any cities of the world. The average fare in Glasgow is less than two cents; in London people are carried about two miles for one cent on the county council cars. As electric traction, which is now being installed, will enormously reduce the cost of working and increase the carrying power of the systems, we are within sight of universal one cent fares in cities like Glasgow, Nottingham or Sheffield.

EXTENT OF MUNICIPAL TRAMWAYS.

The towns which at present operate their street railways are: Huddersfield, Blackpool, Leeds, Plymouth, Aberdeen, Blackburn, Darwen, Bolton, Bradford, Halifax, Dover, Dundee, Hull, London (partly), Glasgow, Nottingham, St. Helens, Southend, and Southampton.

According to the last Government return, which is for the twelve months ending in June, 1899, the municipal authorities owned 519 miles of street railways (46.3 per cent), while companies owned 602 miles (53.7 per cent). If we excluded London, the municipal lines would equal in extent the companies' lines. The capital expended by the municipalities on their lines amounted to $28,700,000.

These figures only inadequately represent the extent of municipal enterprise, as during last year much progress has been made. The following is a list of towns which have introduced electric

traction for municipal working within the last two years or are about to do so:

Bradford	1898	Blackburn	1899
Glasgow	1898	Bolton	1899
" extension	1899	Hull	1899
Halifax	1898	Leeds, extension	1899
Liverpool	1898	Plymouth	1899
" extension	1899	St. Helens	1899
Aberdeen	1899	Sheffield	1899

Under Construction.

Darwen,	Halifax, extensions,
Barking,	Huddersfield,
East Ham Urban District,	Liverpool, extensions,
Salford,	Newcastle,
Glasgow, extensions,	Manchester,
Southend,	London.

Last year over forty municipalities obtained powers to construct new tramways. The capital expenditures which some of those new enterprises involved were:

Nottingham	$2,925,000	Sunderland	$1,050,000
Glasgow	2,500,000	Wolverhampton	1,050,855
Newcastle	1,600,000	Darwen	185,000
Salford	1,150,000	Kirkcaldy	675,000
Ayr	350,000	Leeds	350,000
Belfast	630,000	Wallasey	425,000
Bradford	750,000		

During the present session municipalities are providing bills which will involve a capital expenditure of $50,620,000, while the bills introduced by companies will involve an outlay of about $13,000,000, and some of these are certain to be defeated. Manchester corporation alone is preparing to spend $15,000,000 on its new electric tramways. I mention these figures to show the enormous expansion of municipal street railways now on the way or in prospect.

MUNICIPALITY *vs.* COMPANY.

I am convinced that municipalities can operate street railways more efficiently and more economically than profit-making companies, but full comparisons are difficult to obtain and compari-

sons between systems which are not the same are valueless. Even when dealing with the same town allowances must be made between a worn out system, and new lines and new plant. The cities of Sheffield and Nottingham afford good examples, as in both cases the municipality took over the service from a company exactly as it was—plant, cars, horses and staff. The citizens felt very keenly on the subject in both cases, and were determined to make the municipal tramways successful. It is the object of the municipality in both examples, and in all other cases of municipal working, to study the comfort and convenience of passengers from first to last. The following comparative returns relating to Sheffield show the effect of municipal management:

Company's last year, ending 30th June, 1896.		Corporation's first year, 11th July, 1896, to 30th July, 1897.
9	Approximate street miles of tramway (double lines)	9
692,855	Number of miles run	733,262
6,566,033	Number of passengers carried	8,453,078
£39,995—2—4	Receipts from passengers	£46,517—2—4
13.85s.	Receipts from passengers per mile run	15.22s.
£4,443—18—0	Receipts from passengers per street mile of tramway	£5,168—11—4
34.48	Average number of cars running daily	36.48
3,621	Average number of passengers per car, per week	4,569
£22—1—1	Average receipts, per car, per week	£25—2—10
312	Average number of horses	340
9s. 0d.	Average cost of forage per horse per week	7s. 9½d.

It will be noticed from the above that working exactly the same systems nearly two million more people were carried and that the receipts increased. It should be explained that the first thing which the corporation did was to reduce fares, to put on workingmen's cars, and treat the employees better. The following table shows in more detail the benefit of municipalization as experienced in the conservative city of Sheffield.

COMPANY.		CORPORATION.		CORPORATION INCREASE.
INCOME—TRAFFIC RECEIPTS.				
Half year to Dec., 1895..	£20,054	Half year to Dec., 1896..	£21,923	£1,869
Half year to June, 1896..	19,941	Half year to June, 1897..	24,593	4,652
	£39,995		£46,516	£6,521
EXPENDITURES.				
Half year to Dec., 1895..	£16,519	Half year to Dec., 1896..	£16,677	£ 158
Half year to June, 1896..	16,830	Half year to June, 1897..	22,742	5,912
	£33,349		£39,419	£6,070
RUNNING EXPENSES.				
Half year to Dec., 1895..	£8,580	Half year to Dec., 1896..	£8,728	£ 148
Half year to June, 1896..	8,035	Half year to June, 1897..	13,109	5,074
	£16,615		£21,837	£5,222[1]
TRAFFIC EXPENSES.				
Half year to Dec., 1895..	£4,077	Half year to Dec., 1896..	£4,153	£76 Decreased Expenditure.
Half year to June, 1896..	4,409	Half year to June, 1897..	3,638	£771
	£8,486		£7,791	Net Decrease, £695
EXCESS OF TOTAL INCOME OVER TOTAL EXPENDITURE.				
Half year to Dec., 1895..	£3,931	Half year to Dec., 1896..	£5,483	£1,552
Half year to June 30, 1896	3,509	Half year to June, 1897..	6,111	2,602
	£7,440		£11,594	£4,154

Increase in wages bill by corporation....£2,423

The last item—the increase in the wages bill—which carries with it a reduction of hours, had something to do with making the municipal working so conspicuous a success. The first thing which Nottingham Corporation did was to reduce the hours of the drivers and conductors, give them smart uniforms and increase their wages, the comfort of passengers depends a good deal on the treatment they receive from the conductors and the behavior of the conductors is regulated somewhat according to the treatment they receive from their employers. What happened in these towns has occurred elsewhere—in Glasgow, Liverpool, Plymouth, London and other places, when the municipality has undertaken the working of the tramways. Take by way of illustration, two

[1] £5,996 expended by the corporation in additions to premises and stock (horses, cars, omnibuses, etc.), as against £1,656 by the company, or a difference of £4,339.

examples of municipal enterprise which it never occurred to the companies to inaugurate. Nottingham like other industrial centers is a great center for football and other games played on Saturday afternoons. The corporation made special arrangements for carrying visitors to and from the playing field. In London, there was no means of locomotion after midnight, and the railway cars and omnibuses did not start early enough in the morning. The county council began by running its cars and buses, which feed its lines, all night and stimulated by its examples, the companies did the same, so that now Londoners have plenty of facilities for getting about at night.

British experience suggests other strong reasons in favor of the municipal management of street railways, provided you have as in Glasgow, Sheffield, and other cities councils consisting of public-spirited men who control the communal industries in the interests of the people, and if you have a staff of officers chosen for their qualification and promoted according to merit. In such cases mayor, aldermen councillors and officials can have but one object—to manage the street railways in a way which will give the greatest benefits to the traveling community. The law precludes towns from reducing fares to such an extent that the undertakings are rendered unprofitable.

When companies operate lines in English cities, there are always dangers and temptations which strike at the purity of local government. Where companies exist local aldermen and councillors are generally represented on the board of directors. A company promoter would naturally seek the co-operation of members in this way in their own interest, not for the sake of the traveling public. Companies always mean dual control over the streets, differences about paving, favoritism, and petty bribery in the form of free travel for policemen, free tickets the introduc- for councillors, officials, and reporters, etc. The door is open for tion of insidious corrupting influences which experience has shown do not exist under municipal ownership.

GLASGOW'S MUNICIPAL TRAMWAYS.

By Milo Roy Maltbie.

[Note.—The following facts were gathered during a week's visit in Glasgow in the summer of 1899, at the close of a two months' study of municipal problems in Great Britain. Interviews were had with prominent persons holding every sort of opinion, and the history and working of Glasgow's street railways were thoroughly gone into. The results, in proof, were then submitted to Mr. John Young, the efficient manager of the Tramways Department, to whose ability is largely due the success of the undertaking. Every fact and statistical statement was examined and verified by some member of the Department, to which the writer is greatly indebted for many facts and figures which could not have been secured elsewhere. The following analysis is now believed to be entirely accurate.]

Municipalization of street railways is a product of the present decade. Prior to 1893 only one municipality in Great Britain—Huddersfield—was actually operating its tramways. At present there are at least nineteen. The movement has become so general that every few months add another to the list.

The recent increase in activity in this direction is due principally to three causes. First; many leases have recently terminated, and thus the question of private or municipal operation has been brought prominently to the front. The Tramways Act of 1870 permitted local authorities to construct street railway lines and to lease them for twenty-one years to private companies, but did not authorize operation by local authorities. During the '70's many lines were constructed, and the twenty-one years of the lease having passed, the question now arises in the '90's, Shall the system of municipal ownership and private operation be continued, or shall the municipality undertake operation as well? Opinions may differ as to the merits of "ownership and lease," but the statement is unquestionably true that this system is more favorable to complete municipal operation than is private ownership and operation, even though the city has the power to buy out the company at any time. The former compels action to be taken, while under the latter, any movement for municipalization is obliged to overcome a large amount of inertia and to accept

the burden of proof. These factors often kill the scheme in its infancy. It was probably not the intention of the framers of the Act to give such advantages, but experience shows that they exist.

Second; the movement for larger municipal activity dealt first with those functions which could most easily be taken over. Thus, only lately has it reached those matters which offer greatest objections, of which operation of street railroads is a good example. The acceleration of the movement for greater municipal activity just at this time has made it appear all the more sudden.[1]

Third; the experiments in municipal operation have been so successful, that other cities, desiring to achieve similar results, have followed the example. This is a very important factor. As a theory, municipal socialism has been studied very little in Great Britain. The movement has proceeded with little discussion as to its theoretical justification, advantages and results. Experience, experience, experience, has been the *sine qua non*. Where there has been a strong belief that better results could be secured under municipal management, especially if some other city has been successful, municipalization has been adopted.

Of all the experiments in municipal operation, none has done so much to hasten municipalization in Great Britain as that of Glasgow. A study of Glasgow's tramways is important, therefore, not only because it may throw some light upon the general question of municipal control of street railways, but because it shows what factors have influenced other cities to follow, and thus clearly indicates the purposes for which municipal operation has been undertaken.

I.

MUNICIPAL OWNERSHIP AND PRIVATE OPERATION.

In 1870, two rival companies applied to Parliament for powers to operate lines. The town council, hostile to both projects, secured the amalgamation of the companies and caused a provision to be inserted in the bill authorizing the city to lay tracks, provided it decided to do so within six months, and to lease the lines to a private company or to adopt municipal operation. This last provision was probably an oversight, as Parliament strongly opposed the extension of municipal activity in this direction; and in

[1] It is impossible here to go further into the philosopy of the growth of municipal functions. Thoes interested will find it discussed more fully in Maltbie, *Municipal Functions*, MUNICIPAL AFFAIRS, Dec. 1898.

the general Tramways Act of the same year, it was expressly stated that power to operate was not conferred upon any municipal authority.

CONDITIONS OF LEASE.

Immediately after the enactment of the bill, the council decided to construct tramway lines rather than permit a private company to do so, and in July, 1872, the first line was opened. A private company leased the lines from the city, agreeing to pay

(1) The interest on the entire amount borrowed by the city for the construction of tramways;

(2) A sinking fund of three per cent on the same capital expenditure, which was to be used by the city in writing off capital, so that at the end of the lease the entire indebtedness would be wiped out;

(3) A yearly sum equal to 4 per cent on cost of construction, which was to form a fund for replacing the track as rapidly as it became worn out;

(4) A mileage rate of $750 per mile per annum; and

(5) All expenses incurred by the city in connection with tramways.

The company further agreed

(6) to pave and repair the roadway between the rails and eighteen inches beyond the outer rail.

The lease was to run for twenty-three years, or until July 1st, 1894, and it was expected that when lines were constructed, not included within the lease, similar conditions would be agreed to. As a matter of fact, not one of the subsequent leases was so favorable to the city as the above. The Agreement of 1879, for example, contained no provision for a sinking fund or a renewal fund, and similar omissions are found in other instances. All were to terminate in 1894; but before describing how municipal operation came about, it may be well to summarize briefly the experience of Glasgow under the system of municipal ownership and private operation, for it throws some light on what may be expected, should a similar plan be adopted in American cities.

NEW LEASES NOT SO FAVORABLE TO CITY.

When the question of leasing new lines came up, the company which had signed the original lease soon perceived that it had an advantage over competitors and the city as well. For when once

a company has secured control of a rather large mileage, a new company cannot offer as good terms as the one already established. The expense of operating a short line is much larger *relatively* than that of a longer line. Further, the multiplication of independent companies necessitates frequent changing of cars and higher fares, thus the traveling public prefer to accept less favorable terms from the established company rather than introduce competing lines. The Glasgow company soon realized the advantages of its position, and could not be induced to offer as favorable terms as had been inserted in the original lease. This fact does not wholly account for the difference between the first agreement and those of later dates (part being due to less favorable situation of some of the lines), but it is a factor which should be reckoned upon in every discussion of public control of street railways, and was of no mean importance in Glasgow.[1]

DISAGREEMENT BETWEEN COMPANY AND CITY.

Upon another point the experience of Glasgow has been the experience of other cities, namely, disagreement as to where and when new lines were to be constructed. The city (or the Corporation, as they say in Great Britain) was anxious to have the tramways keep pace with the growth of population, and to provide every section with adequate transportation facilities. The private company desired larger net profits, and unless these could be secured, it did not favor extension. The tendency of the company was to be unduly conservative, while the municipal authorities were apt to be in advance of traffic. But whether both were wrong or whether one was right and the other wrong, does not matter greatly. The essential fact is that disagreement and lack of harmony resulted. There was no open rupture, but there was an absence of that co-operation without which the system of ownership and lease cannot be thoroughly successful; and these relations led to bad results when the question of renewing the lease came up.

[1] According to the agreement under which the Edinburgh tramways are now leased to a private company, all new lines constructed by the city *must* be operated by the company and upon the same terms as the original lines. Thus, the city can build tracks wherever it wishes and compel the company, if necessary, to work them and pay for them, even though it may mean a financial loss to the company. However, the municipal authorities have been very considerate of the welfare of the company and thus far have not acted unfairly.

EFFECT OF SHORT LEASES ON SERVICE.

The character of the service during the period, 1871 to 1894, was such as to leave considerable room for improvement. Mechanical traction had not been adopted, although the company had made an offer in 1891 to introduce it, provided a new lease was made. But by this date municipal operation had almost been decided upon, and of course the proposition was rejected. Doubtless the limitation of the franchise to twenty-three years somewhat retarded development. But British conservatism is an important factor and when comparisons are made between Great Britain and the United States it must not be forgotten that inventions are not so quickly adopted there as here and that railroading in nearly every form is considerably more advanced in the United States.[1] And certainly as respects the number and character of cars, civility of employees, rapidity of service, etc., short term franchises have slight effect. However, as regards such improvements as are remunerative only where a considerable period is considered, short term leases do act to prevent their adoption, and actually did so in Glasgow towards the end of the lease. That there were compensating advantages in the shape of better control over the streets—the public property—and of better facilities for the taking over of the tramways by the city is also true.

FINANCIAL RESULTS.

From the financial point of view, the system of ownership and lease was a success both to the city and the company. The company made all payments promptly, and the city thus was enabled to fulfil all its obligations. During the twenty-three years of the lease, a capital expenditure to the amount of $1,725,000 had been incurred, of which $1,007,500 had been paid off, leaving $717,500 in loans outstanding.[2] The tracks had been kept in repair and were worth more than the remaining indebtedness. $634,500 had been spent upon renewal of permanent way. $318,000 had been carried to the "Common Good"[3]—an average of nearly $13,830 per year. This had been made possible not by any express provision of the lease, but merely by the method of dealing with the sinking fund. The mileage rate, amounting to some

[1] This phase is more fully discussed on page 49 *infra*.

[2] A £ sterling has been figured throughout as equivalent to $5.00.

[3] For explanation of this fund see page 56 *infra*.

$15,000 during each of the last two years, went of course to the "Common Good." Then a further annual profit, amounting to $13,000 for the last year of the lease, was secured in this way. The company was obliged to pay to the city interest on the capital *expenditure*, but the sinking fund, with accumulated compound interest, was used to reduce the loans actually outstanding. Thus the city received interest on the gross capital expenditure, but paid interest only on the capital less the accumulated interest on the sinking fund, as is shown by the following summarized account for 1893–4:

Payments by the Glasgow Tramway Company to Corporation for year to 31st May, 1894:

Interest on Capital Expenditure	$62,330
Mileage Rate	15,350
Sinking Fund	33,625
Renewal Fund to meet obligations of Company in maintaining lines	37,280
Allowances for Chamberlain's office, etc	1,500
Total	$150,085

Payments by the Corporation out of the above were as follows:

Interest	$49,380
Sinking Fund	33,625
Sum repaid to Company for maintenance of lines	37,280
Expenses of Chamberlain's Office, etc	1,500
Common Good	28,300
Total	$150,085

II.

MUNICIPAL OPERATION.

In 1889, five years before the expiration of the leases, negotiations for renewal were opened. The city submitted "conditions of let." The company replied that they were too onerous and vague, and made counter propositions. These were not satisfactory to the municipal authorities, and after much correspondence and numerous attempts at conciliation, it became evident that agreement was practically impossible. At this juncture, municipal operation was suggested, and in the municipal elections of 1890 and 1891, particularly the latter, public opinion seemed to strongly favor the plan. The following year, the council decided

to try the experiment, and offered to purchase the plant and equipment of the private company. But again, terms could not be agreed upon.

A stupendous task now confronted the city. Within less than two years, a complete plant for operating the street railways had to be provided; barns, stores, workshops and sheds erected; cars built or purchased; horses bought and trained; men employed and taught to handle cars and horses; etc., etc. Yet all this and more was accomplished within the required time—a task as one looks back upon it, that seems almost impossible.

At midnight, Saturday, June 30, 1894, the leases expired, and the company withdrew its cars, horses and men promptly. The following morning at four, the city began operation with all the paraphernalia, even to shoeing forges, in readiness. The old company began competition by running omnibuses, but even under such disadvantages as the Department was working, the contest was very one-sided. The omnibuses disappeared one by one. The company lost severely. The expense to the city was much heavier than it would have been, had an agreement with the company been possible.

The results of municipal management during the five years, 1894–1899, call for extended notice, not only because of their own importance, but because they have been so often misstated, and because no one factor has had a greater influence upon other municipalities than the experience of Glasgow. In nearly every British city where municipalization is advocated, it is to Glasgow that one is referred for proof, and it is to achieve the same results that Leeds, Liverpool, Manchester, London and other cities have undertaken municipal operation.[1]

[1] Probably the most disparaging account of the Glasgow tramways written by an eminent person appears in the Report of the Massachusetts Special Commission on Street Railways, 1898. Mr. Robert P. Porter, the author of this paper, "Municipal Ownership and Operation of Street Railways in England," assumes that the proper test of success or failure is a comparison with American conditions, and he ignores comparisons between municipal and private operation in the same city and between different cities in England. Whether this is proper, and how far the less efficient service of British cities generally is due to municipal control, are discussed on pages 49 *infra*. However, I would suggest that the reader examine Mr. Porter's account, noting particularly the prophecies of future troubles which he then made, but which have not come true.

FARES REDUCED.

The change which attracted most attention probably, and one which came into operation on the first day of municipal control, was the reduction of existing fares and the introduction of "half-penny [one cent] stages" or "runs." The following table will show the difference between the new and the old régime:

Fares.	Present Distances. (Municipal Operation.)	Former Distances. (Private Operation.)
½d	.58 mile.	None.
1d	1.75 "	1.12 mile.
1½d	2.33 "	1.80 "
2d	3.47 "	2.20 "
2½d	4.18 "	None.
3d	5.34 "	3.23 mile.

The average fare per passenger has also declined from 1.17d. (2.34 cents) just prior to expiration of lease to .875d. (1.75 cents) during 1898–99, which is the lowest in Great Britain.

The city also adopted a special rate for workmen (artisans, mechanics and daily laborers) from 5 to 7 o'clock in the morning and from 5 to 6:15 in the evening, provided in the latter instance they ride outside. The following are the average distances that may be traveled at the respective fares:

Fares.	Workmen's Fares.	Ordinary Fares.
½d	.58 mile.	.58 mile.
1d	2.33 "	1.75 "
1½d	3.47 "	2.33 "
2d	5.34 "	3.47 "

Although, from the point of view of general welfare, a uniform system of fares regardless of distance may be preferable to the "zone system" where fares vary according to distance, municipal operation is not alone to be blamed for failure to adopt one fare, as is claimed by some writers. There is scarcely a railroad in Great Britain which charges a uniform fare, either under private or municipal management, the most important exceptions being the overhead railway along the docks in Liverpool and two short lines in London. The British public have become so accustomed to fares varying with distance and so well pleased are they with the system, that neither private nor municipal lines have the courage, even if they believed uniform fares to be better—by no means universally admitted—to fly in the face of public opinion, and invite opposition and reduced traffic by changing to a

uniform fare. Further, a change on one line would be disastrous unless other lines followed, for the short distance traffic would all go to the lines having variable fares, and the long-distance traffic —the more expensive—would go to the lines having a uniform fare. At least such would be the case wherever possible. That an extension of the principle already in vogue by the introduction of "half-penny stages" is popular, is shown by the fact that about one-third of the total number of passengers are carried for a half-penny (one cent), and that a large proportion of the increased traffic came under the cheapest fare.[1]

SERVICE IMPROVED.

The reduction in fares was accompanied by an improvement in the character of the service. Of course the city had the advantage of starting with new cars, but they have been kept well painted, well cleaned and well lighted. Advertisements have been banished, further improving the appearance of the cars, although diminishing by many thousands the revenue of the undertaking.[2] The routes are painted conspicuously on the end and side boards, and the cars of the various routes can easily be distinguished at some distance by their different colors. Most of the cars are "double deckers" accommodating forty persons, but a few on the electric lines are "single deckers" with an entrance in the center. Standing in the aisles is not permitted, and the cars are run so frequently that one seldom has to wait for the car he wishes. Fully twice as many cars are now being run by the city as were used by the old company, although the track mileage has been increased only slightly. Routes passing through the heart of the city have been instituted. All traffic employees, from conductor to point boy, have been uniformed. The horses are kept in excellent condition and one does not see the poor old "shacks" which adorn the streets in some cities. Further, horse traction will soon be replaced by electricity. On two lines the overhead trolley system has been in operation some time; a third was opened last November; and the electrical conversion of the entire system is being proceeded with. By 1901, when an inter-

[1] See also page 52 *infra*. A proposition has recently been made to limit all fares to 1d.—2 cents—or less as soon as electric traction is entirely adopted.

[2] The company received from advertising over $15,000 in 1893. As the number of passengers has more than doubled, probably $30,000 could be added to revenue were advertisements now permitted.

national exhibition is to be held in Glasgow, three-fourths of the mileage will be electric.

It must be said, to avoid misconception, that tramway service in Glasgow is not so good as in similar cities in the United States. But it is illogical to conclude, as some have done, notably Mr. Porter, that the difference is due to municipal operation. By the same process of reasoning one could prove that the very inferior methods of building construction which obtain in London are due to London fog. The fact is that British industry is behind American industry in many ways, and particularly wherever inventions and the adoption of new processes are important elements. In no line does the British manager take advantage of these things so quickly as the American. He is more conservative, slower to experiment, and even more backward in adopting improvements. Consequently, not only British tramways, but British railroads in general and many other departments of industry are considerably inferior to those in the "States." Municipal operation is no more the cause in one case than in the others where it does not exist at all. The only possible exception is in the case of short leases as they approach the date of expiration.

Hence, comparisons should not be made between countries, but rather between cities in the same country, and preferably between different systems of control in a given city at different periods. The elements of variance between different countries are so great and so frequently disregarded, either intentionally or unintentionally, that such comparisons are almost sure to be valueless and inaccurate. And to a considerable extent the same is true of comparisons between cities, even though situated in the same country. Any conclusion can be proved by choosing the proper cities.

Adopting this principle and contrasting the service given by the city Tramways Department with that of the old company, the balance is greatly in favor of the Department and in the directions noted above. The criticism has been made that the Department was very foolish to continue horse traction, particularly when it was necessary to provide a new plant; that electric traction should have been introduced at first. It is to be remembered, however, that there were only two years between the time when the old company refused to sell its equipment and the time when the city was compelled to begin operation. And in any case, the city could

not interfere with the traffic of the old company by tearing up the tracks for electrical conversion. Further, the question of the best kind of traction arose in 1892, and electricity had not then proved an entire success. Indeed, I am not sure but that the Department acted wisely, even if another course had been open. Once firmly upon its feet, it did not hang back, but has shown itself fully alive, eager to adopt improvements and as progressive as any private company in England. I know of no tramway system in Great Britain, unless it be that of Manchester, which excels Glasgow; and prior to municipalization, the Glasgow company was greatly inferior to the private company in Manchester. If the present pace is maintained, the municipal tramways of Glasgow will soon be greatly superior to any privately operated system. The already great improvement is certainly very creditable to the Tramway Department and reflects favorably upon municipal operation.

WAGES INCREASED.

The employees have also benefited by the change to municipal working. Without solicitation the Department reduced the hours of labor to ten per day, whereas under the company, all—except the office staff—worked at least twelve hours, and some fourteen or fifteen per day. Wages per diem have not been reduced accordingly, but actually have increased about fifteen per cent upon an average. Thus the employee works fifteen per cent less hours and gets *in toto* fifteen per cent more wages.[1] Further, uniforms are furnished free[2] and also transportation of employees in uniform. Sick and superannuation funds have been provided, the employee paying 6d. per week and the department 4d. Of this sum, 8d. is carried to a sick fund from which, while incapacitated, a member receives 15s. per week; and two pence goes to the superannuation fund, from which, if unfit for work after fifteen years' membership, the employee receives ten shillings per

[1] Wages are much lower in Glasgow than in the United States, and some would have us believe that the difference is due largely or in part to municipal control. Nothing is farther from the truth. Wages in every occupation are much lower in Great Britain than in the United States, and the difference is no greater in municipal water works, gas works, electric supplies or tramways than in other industries. In fact, when a city has taken over an undertaking, it has frequently raised wages, so that instead of grinding the laborer down, municipal operation tends to better his condition. Then, too, wages are not as low as they seem. The purchasing power of 4s. in England is much greater than $1 in the United States.

[2] The old company furnished a cap and coat, but the city goes further, providing a complete outfit.

week, the allowance rising at the rate of one shilling per annum until, after twenty-five years' membership, he receives twenty shillings per week. Membership is not compulsory. The Friendly Society has been organized only three and one-half years, but had a balance January 1st, 1899, amounting to $5,000 and during the year the Department had contributed $5,170. According to the report for 1898 the society had spent during the year $14,310. Its membership was 2,000 at the close of the year; 968 had received "sick aliment," the average paid being $9.52.

RAPID GROWTH OF TRAFFIC.

The popularity of the Glasgow tramways is manifested by the number of passengers carried.

Tramway Company	during 1885	carried	41,588,322
" "	" 1889–90	"	50,237,995
" "	" 1893–94	"	53,729,472
Corporation Tramways (11 months)	" 1894–95	"	57,104,647
" "	" 1895–96	"	86,462,594
" "	" 1896–97	"	98,966,658
" "	" 1897–98	"	106,344,437
" "	" 1898–99	"	118,775,668

In the four years from 1889–90 to 1893–94, the traffic of the company increased fourteen per cent, while under municipal management, it increased over 100 per cent in the same length of time. Comparing Glasgow with other British cities, taking as a basis either track mileage or population, there is not a single instance where so many passengers are carried.

This is partially due to the lack of other means of transportation. There are practically no bus lines as in London. As has been stated, buses were tried in Glasgow, but proved a failure. Cabs are used much more than in American cities, but to no greater or less extent than in other British cities. The steam railroads, whose tracks are below the surface level, carry a considerable number, but no figures are given, as city and suburban traffic is not kept distinct from other passenger traffic. The only other means of transportation is the Glasgow District Subway, a cable road, running entirely under the streets. It is owned and operated by a private company with a capital of $7,500,000; receipts, $360,000, and working expenditures, $170,000. This company carried 13,200,000 passengers in 1898–9. The 6.55 miles of double track form a belt line extending from the center of the city westward, serving the most populous portion of the city.

The causes of the increase under municipal management are difficult of precise definition. Track mileage has increased only slightly.[1] Population in the areas already served has not become sufficiently dense to explain it. One-third of the passengers pay penny fares, but many would have ridden if fares had not been reduced. But probably the improved service and lower fares account for three-fourths of the increase. The theory that the people ride because the tramways belong to them indirectly, is wholly erroneous. Such a sentiment has little effect on tramway patronage. The service is better and cheaper. It pays to ride.

Such are the social effects which have attended municipalization in Glasgow. One sometimes hears it said that the same improvements *would* have appeared had a new lease been granted to the private company. Perhaps! But the fact remains that no movement was made in that direction up to the time the lease expired. Certain of the improvements were named in the "conditions of let" which the Corporation submitted to the company in 1889, but the company deemed them "too onerous." Possibly the company would have been moved by different motives after 1894 than before. This is doubtful to say the least.

TRAMWAY FINANCE.

Coming to the financial aspects of municipalization one finds himself on more debatable ground. Concerning depreciation and sinking funds there are so many conflicting views that a proper basis of comparison is hard to find. Perhaps a comparison with private companies and a summarizing of statistics may help to clear the atmosphere. It should be kept constantly in mind, however, that the first years are the most unfavorable, that many expenses appear which are soon eliminated or greatly reduced. Especially is this true of the Glasgow tramways, the operation of which by the municipality began under peculiarly unfavorable and disadvantageous circumstances.

The following table of receipts and expenditures has been compiled from the published reports. (To facilitate comparisons, the amounts have been changed to American money, considering a pound sterling equivalent to five dollars.)

[1] Total length of lines just prior to July 1st, 1894—beginning of municipal operation—was 80 miles double track, 60 miles single track. On May 31st, 1899, the city owned 86 miles double track or 73 miles of single track, not including depot lines in either case.

FINANCES OF GLASGOW'S TRAMWAYS.

Period.	Receipts.	Expenditures.	Balance.	Disposal of Balance.						
				Rent of Lines Outside City.	Interest on Capital.	Sinking Fund.	Depreciation.	Perm't Way Renewal Fund.	General Reserve Fund.	Common Good.
1894-1895 11mos.	$1,122,970	$953,575	$178,495	.....	$57,470	.....	$45,970	$33,753	.....	$41,268
1895-6	1,671,885	1,255,550	416,335	.....	68,283	$52,710	89,041	85,000	$21,296	45,000
1896-7	1,854,410	1,431,430	422,980	$12,228	69,174	54,027	87,550	75,000	100,000	45,000
1897-8	1,970,556	1,467,560	503,695	24,467	67,495	55,378	113,430	19,775	177,170	45,000
1898-9	2,196,120	1,590,525	605,590	24,544	64,658	56,762	145,788	.....	268,868	45,000

Translating this table into more intelligible terms, one finds that receipts have nearly doubled while working expenditures have not increased at the same rate; thus "gross profits" have increased nearly 150 per cent. Interest has remained nearly stationary, and the same is true of payments to the sinking fund and "Common Good," the large increase being found under payments to depreciation fund and general reserve fund.

Suppose for a moment that these accounts were those of a private company. Assume that the same sums were paid for rental of lines outside Glasgow and to the "Common Good." Assume, also, that a sinking fund was maintained, an assumption not so likely of fulfilment. What dividends would be declared? Taking the capitalization roughly as $2,915,000 in 1895–6, the dividend would amount to nearly eight per cent, still leaving $100,000 to be carried to a renewal fund in addition to the sinking fund. By June 30th, 1899, the dividends would have increased to fourteen per cent, a sufficient amount again having been expended from revenue to keep the lines in good condition.

Let us assume another set of conditions. Suppose the tramways were to continue for the next twenty-five years upon exactly the same conditions as during the last five. What would be the position of the city in 1925? First, all working charges, rentals, interest and payments to the "Common Good" would have been met. The equipment would be in as good condition as to-day, sufficient sums having been spent for maintenance and repairs under working expenses, and for renewals out of the permanent way renewal fund. A sinking fund would have been provided that, by that date—1925, would wipe out all indebtedness, and the entire system would be a valuable asset against which not a single bond would be outstanding. A depreciation fund would

have been accumulated, amounting to $14,000,000; including interest, about $21,000,000. Further, there would be a general reserve fund of $19,000,000; including accumulated interest, at least $28,000,000. In short, there would be about $50,000,000 to be used as desired. Though such might be the practical result, it is, however, scarcely probable that it would take this form. For the system would need to be extended and new forms of traction introduced which would economically use funds otherwise available for repayment of capital and depreciation and reserve funds.

DEPRECIATION AND RENEWALS.

To return to more tangible things, viz., the analysis of the figures of the past five years, the question upon which there is apt to be most disagreement relates to depreciation. An examination of expenditures shows that during the past five years over $1,050,000 have been spent out of revenue for "maintenance and renewals," an average of $210,000 per year, equivalent to seven per cent of the average capitalization. In addition, $132,500 have been spent for renewal of permanent way *via* Permanent Way Renewal Fund; and a balance of $243,875 accumulated. Undoubtedly this is abundantly sufficient to keep the system up to its original degree of efficiency.

The Depreciation Fund has received on an average $92,355 per year, or three per cent of the capital. An analysis of the capital account for the various years shows the following:

	Average Capital Expenditure During 5 Years.	Total Depreciation for 5 Years.	Percentages of Depreciation.	
			5 Years.	Per Annum.
Permanent Way	$906,575[1]			
Grounds, Buildings and Fittings	$939,642	$49,779	5.29	1.06
Machinery and Plant	57,510	24,164	42.01	8.40
Horses	580,166	235,840	40.65	8.13
Harness	33,532	15,933	47.51	9.50
Rolling Stock	286,021	69,805	24.40	4.88
Equipments	16,096	8,929	55.47	11.09
Uniforms	13,755	6,756	49.11	9.82[2]
Office Furniture	5,244	2,541	48.45	9.69
Preliminary Expenses	191,062	38,995	20.41	4.08
Lease of Govan and Ibrox Tramways	18,527	2,915	15.74	3.15
Electrical Equipment	163,170	6,119	3.75[3]	.75
Total[4]	$2,804,725	$461,776	20.86	4.07

As far as I am able to judge, not only from a careful examination of the accounts, but of the lines and equipment, ample allowance has been made for renewals and depreciation—much more than is usually made by a private company.

But in connection with these accounts, two other funds must be considered. According to the Act of 1893, two per cent must be set aside as a sinking fund. This, accumulated at two and one-half per cent, is calculated to wipe out the debt in thirty-three years from the date of borrowing. This provision might quite properly indeed be deemed sufficient, without any depreciation whatever being written off. But the Tramways Committee, anxious to maintain the Department on an indisputably sound financial basis, have, in writing off depreciation in addition to setting aside the statutory sinking fund, exceeded all ordinary ideas of commercial safety. Further, a general reserve fund has been created which already amounts to nearly $627,330, the yearly average thus set aside being $125,466 or 3.9 per cent of the average annual capital. This fund may be used for a variety of purposes, but is principally intended for expenditure in connection with change of traction, etc., instead of increasing the capital account by the amount of the same. Thus the average sum set aside for the writing off of capital really amounts to over eight per cent. And in the meantime, I beg you to remember, the system has been maintained in excellent condition. In fact, I see no basis for the criticism that future advancement has been sacrificed in order to show great present financial success.

These various funds have not been kept in the form of cash on hand, but have been used to meet additions to capital outlay, so that while capital expenditure less depreciation has risen from $2,718,810 to $3,332,375—an increase of $613,565—the loans outstanding have actually decreased $173,650.[5] Of course the prac-

[1] The Permanent Way Renewal Fund is practically a depreciation fund as far as there is any need.

[2] Nearly one-half was written off in one year. The capital charge has been stationary for the past few years, the Department holding that on June 1st of any year the fair value of the uniforms is approximately $7,000.

[3] Electric line has been in operation not quite eight months.

[4] Exclusive of Permanent Way.

[5] Date.	Capital. (Less Depreciation.)	Loans Outstanding.
1895, May 31st.....	$2,718,810	$2,635,490
1896, " "	2,914,965	2,582,780
1897, " "	3,001,880	2,582,780
1898, " "	3,013,265	2,432,780
1899, " "	3,332,375	2,461,840

tical result to the city is the same whether the surplus is allowed to accumulate at compound interest, or is used to avoid issuing additional bonds. For instance, several miles of track have been prepared for electric traction and a small power house built from which to operate some six or seven miles of double track, but not a bond has been issued to meet the expense.

PRIVATE *vs.* MUNICIPAL MANAGEMENT.

Comparing the present period with private management, one finds that from 1885–1889[1] inclusive, the company spent from revenue for maintenance and renewals an average of $105,000 per year or 6¾ per cent of their capital. Payments to depreciation and reserve funds, excluding the amount payable to the city under the lease, amounted to $\frac{5}{10}$ of one per cent of capitalization, as compared with the 8 per cent now being paid by the city.[2] Yet cars, horses and other equipment belonging to the company are much shorter lived than track upon which there was a depreciation and reserve fund of 7 per cent.

WHAT OF THE TAXPAYER?

The reader may have noticed that with the exception of payments to the "Common Good" nothing has been said as to taxes. Upon this point, the Glasgow tramways occupy a peculiar position. The Department cannot pay any deficit it may have by levying taxes. It must carry it forward to the next year, or have an amount transferred from the Common Good, or issue bonds—an alternative which would require a special act of Parliament. Neither can it use any surplus to decrease taxes. It can, as it does, pay an amount into the Common Good, but as this fund does not and cannot receive one penny from taxation, even indirectly the taxpayer is not benefited.[3] The $45,000 that the tramways yield annually permit greater expenditures for such purposes as city churches, monuments, public recitals, subscriptions

[1] I have selected the period from 1885–1889, because it is fairly representative of the company's management. After 1889, when it became certain that the company would not get a new lease, they began writing off the capital at a much more rapid rate. They were compelled to do so or face a tremendous loss. They cut their dividends in two and used this sum to write off capital. Since 1889, therefore, the conditions were abnormal.

[2] From 1885 to 1889, the company paid to a depreciation fund $18,175 annually. The capital stood at $1,575,000.

[3] The revenue of the Common Good is derived from markets, halls, real estate, invested funds and the tramways. For the year 1897–8, the receipts of this fund amounted to about $371,000.

to various enterprises and entertainment of noted persons, but the taxpayer *as a taxpayer* is not benefited one farthing. Whatever of benefit accrues to him comes to him as a citizen, tramway employee or tramway passenger, but never as a taxpayer. This peculiarity is perfectly logical, for if he cannot be called upon to share a deficit, why should he share a surplus?

However, it should be noticed that whereas the Common Good received only $26,600 per year during the last five years of company management, it now receives some $45,000. This is not offset by a remission of taxes paid by the private company, for the Tramways Department pays exactly the same local and imperial taxes, etc. (pro rata), as did the private company. Further, it is charged for water, gas, electric lighting, etc., on the same terms as a private consumer.

Since such are the results of the working of tramways by the city, and since the principle of not making a profit but of lowering prices as fast and as far as receipts will permit, applies equally to the city's gas works, water works and electricity supply, it is difficult to understand the origin of the report which has been so widely quoted in this country to the effect that Glasgow made such large profits from its municipal undertakings as to render taxes unnecessary. The statement is untrue and grossly misrepresents the policy of the city authorities. Instead of decreasing, taxes (or rates as they say) are increasing.[1]

PARTISAN POLITICS.

But what has been the effect of partisan politics upon municipal operation and of municipal operation upon politics? Very

[1] MUNICIPAL TAXES IN GLASGOW.
Total Rates Levied for all Purposes (Barony Parish).

Year.	Rents £10 and Upward.	Rents below £10.
1887-88	2s. 6d.	1s. 10½d.
1888-89	2s. 6½d.	1s. 10½d.
1889-90	2s. 6d.	1s. 10½d.
1890-91	2s. 6 1/16d.	1s. 10½d.
1891-92	2s. 6½d.	1s. 10½d.
1892-93	2s. 8d.	1s. 11½d.
1893-94	2s. 10 5/16d.	2s. 2 5/16d.
1894-95	2s. 8½d.	2s. 1 9/16d.
1895-96	2s. 9½d.	2s. 2d.
1896-97	2s. 8½d.	2s. 1 13/16d.
1897-98	2s. 9d.	2s. 1 11/16d.
1898-99	2s. 11½d.	2s. 4 7/16d. (estimated.

Also, in each year, Tenants, Domestic Water Rate, 6d. per £.
Owners, Cleansing Private Streets and Courts, 1d. per £.
Owners, Stair Lights, 10s., and Court Lights, 15s. each.

slight, indeed. One does sometimes hear the fear expressed that the employees of the Department may use their power as voters to better their own condition at the expense of the public welfare. But when pinned right down to facts, no one says that it has been done. The Department has raised wages, and perhaps it has done so in order to placate the labor vote; I found very few who would affirm that such was the case. It is true that a city employing 10,000 or 12,000 men, (about eight per cent of its voting population) as does Glasgow in all its departments, is in some danger should an attempt be made by the employees to use their power; but as yet no such plan has been tried.

Neither does there seem to be any recognition of political affiliations in the appointment or dismissals of employees. The cases are quite numerous where the applicant will present a letter from an alderman, a councilman or a member of another department. Such an application goes through exactly the same process as any other, and the applicant has no advantages which every other does not possess. All questions are determined by the fitness of the candidate, and no "pull" is sufficiently strong to get an incompetent into office, or keep him there after his inefficiency has been discovered. The spoils system does not exist, and if an attempt were made to introduce it, public opinion would rise and crush the promoter. That this accounts very largely for the success of municipal operation in Glasgow is unquestionably true.

Another factor of an entirely different nature is the small capital expenditure for track. When the city began operation, the thirty miles of double track were valued in the capital account at $717,500, whereas the total capital expenditure up to 1893 had been $1,725,000. While it is true that the permanent way was not worth the original capital expenditure, notwithstanding that the road had been kept in excellent repair, it was worth considerably more than what it stood at upon the books of the city. But this is a two-edged sword, for it means that the depreciation fund prior to 1894 was sufficiently, if not unnecessarily, large. And inasmuch as practically the same sum for depreciation of track has been allowed since 1894 as before, it follows that the depreciation fund is as large and perhaps larger than it need be—a fact which the critics of municipal operation in Glasgow have vigorously disputed.

To summarize: Municipal operation in Glasgow, as compared with private operation in Glasgow, has improved service, reduced

fares, increased wages, shortened hours of labor, developed traffic, paid off part of the capital, kept road in repair, converted a portion to electric traction, and made much larger allowances for depreciation, sinking funds, renewal and reserve funds. Compared with private management in *other* cities of Great Britain, Glasgow has improved its service more rapidly, has been as progressive in adopting new inventions, treats its employees with more consideration, pays as high wages as any and in some cases higher, has developed traffic much more rapidly, has made larger allowances for depreciation, sinking funds, renewals, maintenance charges, etc., and yet furnishes transportation facilities cheaper than in any other British city.

Further; no counterbalancing disadvantages have as yet appeared. Party politics has no recognition in the city departments of Glasgow. The administration is untainted with bribery, corruption, jobbery or inefficiency. Employment is permanent during efficient service, and advancement is dependent wholly upon fitness. The employees have not used their power as voters either directly or indirectly to secure positions, to increase wages, to shorten hours or to retain their positions when incompetent.

The Tramways Department has entirely different objects in view than the private company. "Larger profits," as a motto, has been superseded by "better and cheaper service." Financial considerations have not been lost sight of, but the profits of operation, instead of going into the hands of private individuals, have been used for the general good. In a word, the welfare of the city and its citizens has been made the all-important consideration.

SYRACUSE WATER SUPPLY.

By James H. Hamilton.

The pendulum of public sentiment in Syracuse has been oscillating back and forth between public and private ownership of the waterworks from the time when this convenience was first thought of; and no less than three times, a decision was reached in favor of municipal ownership, the third time proving the charm. The legislature gave the then hamlet the right to operate a system through three elected trustees in 1823, but it was not until 1842 that the first wooden conduit was laid, and then by private capital.[1]

It was not very long until complaints were made on account of the hardness of the water, which was taken from Onondaga Creek, and on account of failure to increase the distributing facilities to meet the growing demand. Public sentiment in Syracuse has not always been effective in accomplishing its purpose, but it is apt to find expression in public meetings and to be felt. So in 1871 public meetings were held and sundry investigating work was done looking to some kind of a change. In 1885 a franchise with a string to it was granted to a paper company.[2] In the same year the pendulum swung again to the side of public ownership and appropriate legislation was procured, but the people took fright and showed a change of heart at a popular election. The selection of a favorable mayor and city council in 1888 brought the pendulum back again, and a commission was appointed and reported; enabling legislation was procured; the

[1] Captain Oliver Teall was given the privilege, in 1825, of building a plant and charging $5 to private families and $10 to boarding houses and hotels. Nothing was done, and in 1832 the time was extended to 1864, and then nothing was done until the permitted rates were increased to $10 for private houses, $10 for boarding houses, and $20 for hotels. Captain Teall took in some partners and the business was carried on under a firm name until its incorporation under the title, Syracuse Water Works Company, shortly after the incorporation of the city in 1849.

[2] Central City Water Works Company was the name of the company. Mr. William Sweet headed another movement in favor of bringing water from Salmon River.

scheme was endorsed by an overwhelming vote of the people; and in 1889 the project was in the process of execution under a body known as the Syracuse Water Board.[1]

SOURCE OF SUPPLY ADEQUATE.

In marked contrast with the parsimonious methods of the private company is the bold, comprehensive yet reasonable plans of the city adopted as soon as control was secured. The commission in determining the quantity of water required, estimated that the daily consumption would average not less than eighty gallons per capita, and that the city would probably increase in the next ten years at the average rate of 5,500 per annum, which would make a population of about 145,000 in 1899; and it was estimated that for the next ten years the rate of increase would average 7,000 per annum; and after that at the average rate of 8,000 per annum. Thus the source selected should be capable of furnishing the city with water for a period of fifty years, and of supplying 87,000,000 gallons daily. After thorough investigation Skaneateles lake was selected, having a water shed of seventy and one-fourth square miles, and a capacity of 43,500,000 gallons per day, or more than enough to supply the city for fifty years at the estimated rate of growth.

The city, however, has not yet acquired the right to the full capacity of the lake, but only to 15,000,000 gallons per day. A portion of the Erie canal's present supply of water is secured from Skaneateles lake, and if Syracuse should ever acquire the right to all of the water from the lake, the canal could be recouped for its loss, either by raising the dam in Otisco lake or by constructing another dam further down, or by the diversion of a stream from the Onondaga Indian reservation. The average daily draft upon the lake by the city, including water used, leakages, etc., has been for the past four years: 1896—7,741,000 gallons; 1897,—7,824,000; 1898—8,553,000, and at the rate of the first six months of 1899—9,841,000. At the present rate of increase the city's rights upon the water will probably be exhausted in about ten years.

[1] The newly elected mayor, Mr. William B. Kirk, was prominent in the movement; Mr. Francis Hendricks, then in the Senate, was chiefly instrumental in procuring the needed legislation, and the commission appointed to investigate the subject, the members of which, for the most part, comprised the membership of the Water Board, consisted of E. B. Judson, James B. Brooks, A. H. Davis, P. B. McLennan, W. H. Warner and W. K. Niver. The final vote of the people stood: 12,212 for to 910 against.

When this time expires, the canal will probably be supplied from other sources. In that event, it is estimated that the city would have no further concern as to its water supply until the population has reached 600,000.[1] At present it is estimated to be 130,000.

The water is received in a fifty-four-inch intake pipe, and from the lake shore conducted through a thirty-inch conduit into the Woodland reservoir, situated at the western edge of the city and which has a capacity of 122,000,000 gallons. From this it is distributed through 157.23 miles of pipe. In case of accident to the conduit pipe by which the reservoir would fail entirely of its supply from the lake, the water stored in it would supply the city for fifteen days—a period long enough to allow the repair of any ordinary damage. But to meet any extraordinary emergency, two other reservoirs, acquired from the old company, with a combined capacity of 200,000,000 gallons, might be brought into use; and a pump set to filling the reservoirs from Onondaga Creek at the rate of 15,000,000 gallons per day. Thus the city is supplied with an ample source of water and with a plant capable of meeting almost any emergency for a long time to come.

QUALITY OF WATER IMPROVED.

The investigation of the commission as to the quality of the water considered the question both from the standpoint of domestic uses, and from the standpoint of its fitness for drinking purposes. The report recites:

"To the ordinary observer Skaneateles would appear more desirable than any other source. It is a body of water fifteen miles long and about one mile wide, with an area of twelve and three-quarters square miles. It is very deep throughout, its shores are abrupt, free from vegetable growth at the water's edge, and the lake is not connected with swamps or marshes. The water is supplied from springs in the lake or in the adjacent hillsides. It is clear and sparkling, has no color, and is comparatively free from all danger of contamination, there being not to exceed 180 dwellings nearer than one-half mile from the shore of the lake, except the village of Skaneateles, which is situated at the outlet, and cannot be regarded as an objection to this source of supply. Actual use and experience have demonstrated that for drinking purposes it is pleasant and wholesome, and is entirely suitable for all domestic purposes."

In finding a relatively soft water, one of the most happy escapes from the existing supply was had. The existing supply contained 34.41 parts of hardness in 100,000, whereas 16 parts of hardness in 100,000 is considered undesirable for use. Skaneateles

[1] These calculations are kindly made by Mr. Howard Soul, C.E. At the present per capita rate of consumption the supply would be sufficient for a population of 750,000.

water ranks high in this regard, containing only 9.17 parts of hardness in 100,000.

Further, Skaneateles water easily outranked previous sources in point of wholesomeness, as the mortuary statistics indicate. How much credit is due to the water for the low mortality rate, as compared with other cities of the same size, may be a question, but the marked improvement coincident with the turning on of the water from the lake, as shown in the following table, is certainly significant.[1]

Year.	Population.	Deaths.	Death rate per thousand.	Additional number of deaths that would have occurred if the rate of 16.89 had been maintained.
1888	83,540	1533	18.34	
1889	87,738	1444	16.46	
1890	92,889	1616	17.41	
1891	95 878	1554	16.21	
1892	100,179	1660	16.57	
1893	105,202	1721	16 36	
Average death rate per thousand.....			16.89	
1894	111,268	1548	18.91	331
1895	116,564	1558	18.37	410
1896	120,124	1579	18.14	450
1897	122,653	1711	18.95	360
1898	124,853	1683	18.08	465
Average death rate per thousand.....			18.49	Total, 2,016

The improved character of the service under municipal operation is shown also by the fact that the mileage of mains and the number of hydrants has increased rapidly under the new system and in happy contrast to the progress of the old company. From 1857 to 1863 not a mile was added to the extent of hydrants, and the same was true between 1870 and 1876. Compare this fact with the subsequent growth as shown in the following table:

	MILES OF MAINS.	NO. OF HYDRANTS.	POPULATION.
1786.....	.....	.....	2 (white men)
1840.....	.....	.....	11,014
1852.....	3.89	29	.....
1860.....	11.68	113	28,119
1870.....	25.51	287	44,796

[1] *Tenth Annual Report of the Syracuse Water Board to the Mayor and Common Council.* There are other contributory causes to this good showing, however, to which proper credit must be given, as increasing rigor in the enforcement of ordinances for the protection of public health, municipal bathing facilities, more sanitary arrangements for garbage disposal, development of recreation facilities, growth of attractive resorts in the environs, and suburban extensions of the trolley system.

	MILES OF MAINS.	NO. OF HYDRANTS.	POPULATION.
1880	30.58	278	55,563
1890	88.68	889	92 839
1894	79.54	1,408	111.268
1895	126 74	2.078	116,564
1896	133.78	2,154	120,124
1897	148.31	2,374	122.653
1898	157.00	2,482	124 853
1899 (to June 30)	157.23	2,484	126,783

COST OF PLANT.

The most important item in the transition from the old regime to the new was the acquisition of the plant and rights of the old company. Its rights had really been exhausted in 1869, and since then it had been in possession of the field through sufferance. At least the city had had the right at any time after that date to take over the property of the old company according to a stipulated plan.[1] It was acquired on January 1, 1892, under condemnation proceedings, for a consideration of $867,674. For carrying on the work of construction, the city has been bonded from time to time, the aggregate debt reaching $4,000,000 at rates varying between three and four per cent. The premiums on bonds and interest which has accrued on cash in banks have permitted an outlay of $4,164,-014 besides a cash balance of some $5,000. In addition there should be considered the investments in construction work, made from year to year out of gross receipts. The aggregate of such outlays under the head of "new construction" was on January 1, 1900, $289,596, which would make the total investment about $4,493,000. The expert accountant, Mr. Lawrence W. Myers, has made an estimate of all expenditures which could be said to have gone into assets, which would bring the total investment up to $4,532,022.

Whether this sum might fairly be taken, after making allowance for depreciation, as the present value of the property, or the cost of duplication, cannot be answered with any confidence. The award to the old company is sometimes said to have been excessive, and there has been considerable criticism touching the amounts expended for attorneys' fees. Many of the best informed, however, stoutly affirm that the water board acted with wisdom in

[1] Chapter 224, of the Laws of 1849, section 29, provided: "The Common Council of the City of Syracuse shall have the right at any time after the expiration of twenty years to resume all the property, right, powers and privileges of the said Syracuse Water Company on paying to said company the amount of capital stock actually paid in and expended in said works, with fifteen per cent annually thereon, deducting therefrom the actual profits annually received by said company."

both matters. On the other hand, it is stated that the owners of water rights below the outlet of the lake could have put the city to much greater expense had they realized the value of their rights to the city. There are so many elements and complications involved in the situation as to render any satisfactory estimate as to what the works should have cost out of the question. But it must be said that the people in general are satisfied that they received good value for their investment.

VALUE TO THE CITY.

In any event the elements of cost do not tell us much about the present value of the city's industry, for it does not depend upon the amount and cost of material and other property, but upon the earning capacity. It must be remembered also that the city owns only an equity in the plant which must be measured, if it is of measurable amount, by the net earnings after all expenses, including the payment of interest on the bonded indebtedness, have been paid.

The published reports do not on their face reveal the earning value of the plant. The report for 1899 shows a balance of about thirteen thousand dollars; the report for 1898, a deficit of nearly ten thousand dollars; and the report for 1897 a deficit of a little more than a thousand dollars. The first correction necessary in order to get at the facts is the subtraction of the amounts spent for construction and other items entering into assets. The items for construction alone were $35,054 in 1897, $84,539 in 1898, and $78,573 in 1899.[1] Corrections need also to be made from the side of receipts before the net earnings can be determined. The regular allowance for water for city use is $60,000, but owing to delays in payments $90,000 was collected in 1899 and $88,000 in 1898. If these corrections are made on both sides the net earnings for 1899 appear to be $68,830.

If the net earnings for 1899, thus obtained, may fairly represent the commercial earnings of the plant, that is if the tariff of charges represents revenue prices for the service, it might be fair to take them as a basis for capitalizing the city's equity in the plant. For this purpose no account is taken of depreciation or of insurance, because it is thought that the increasing returns which

[1] If for the year 1899, the items for horses, etc., for drinking fountains, for tools, etc., and for engineering and map be included, the amount foots up $84,630.

must almost inevitably result from a rapidly growing city and from an accumulated knowledge of economical administration should much more than balance these items. To be on the safe side these uncertain elements, which nevertheless enter into the estimate of value set by a private corporation, may as well be set off against depreciation and insurance.

When all this is done we may still be at a loss as to the proper rate for capitalization. If the ordinary or reasonable earning power of a municipal industry is taken as the criterion, perhaps 3.5 per cent would not be out of the way. This would make the city's equity worth $1,966,511, or, if the reasonable earning power of a private corporation is taken, 4 per cent might be preferred, which would make the capital $1,720,750. But private capital, in view of its greater capacity for economical administration, would likely value the equity at the former figure. Therefore, it would certainly be within the truth to say that the city has built up an equity of about two million dollars and that the total value of the plant to-day, which cost about four millions of dollars, is nearly six millions of dollars. And it must be remembered that the equity has been built up at no cost either to the taxpayers or to the purchasers of water.

COST OF SERVICE LOWERED.

A word needs to be said in this connection as to the charge to the city for the water it uses, which includes hydrant use, regular flushing at night in cleaning the streets in summer, and practically free water for the schools and other city institutions. During the years 1884–1894, inclusive, the annual charge to the city for water was $26,000, and since then the established rate has been fixed at $60,000. But as will be seen on the table on pages 63–4, the service rendered to the city in that time had increased more than fourfold, there being 322 hydrants in 1884 and 1,400 in 1894, or the city paid about $80 per hydrant at the beginning of the period against about $47 at the close. The increase in the extent of service has gone on so rapidly that the city had in 1899 2,484 hydrants, or it was paying at the rate of only about $23 per hydrant. So the taxpayers have been faring better, considering the quantity of the service, under the municipality than they did under the private system.

Nevertheless, the patronage of the city has been an appreciable boon to the finances of the works, and the increase was made

during a trying time when a good financial showing seemed a difficult matter and when the way did not appear clear to conferring upon the consumers the boon of lower rates. In fact the increase from the city was asked for the express purpose of lowering the rates to private consumers.

The cost of service to private families and to customers generally who use meters has been reduced by about one-half, the present minimum charge per family, which allows 3,600 feet of water, being $5.00 per annum, while the minimum charge made by the old company was $10.00.[1] At first consumers were given the benefit of equitable rates as between each other, and the revenues were considerably increased as a result of a more rigid system of inspection. But still there did not seem to be much prospect of a favorable balance to warrant a reduction in charges. The absorbing interest in the large construction work and the settlement of costly litigation were calculated to make the board move cautiously in the matter of rates. Yet the desire to meet the reasonable expectation of the public for something better in the way of cost as well as in the quality of water, is shown in the request made in 1895 for more compensation from the city. When at last sufficient courage was shown in 1896 to cut the rates almost in two the receipts do not seem to have suffered, since the gross income rose from $160,491 in 1895 to $195,505 in 1896, and to $254,975 in 1897. Neither does the cut in rates made in 1898 seem to have seriously affected the revenues, for in that year they amounted to $309,657, and in the fiscal year of 1899 they were $299,592, a considerable advance over the highest record of the previous rates.

What the future policy as to rates to private consumers may be is a problem. The tendency has been to ask an increasing aggregate sum from the city and a lower rate from private consumers

[1] Under the old company the following are specimen meter rates: For first 2,000 cubic feet, 19 cents per 100 cubic feet; for 20,000 to 40,000 cubic feet, 7 cents per 100; 40,000 to 80,000 cubic feet, 6 cents; and for 120,000 and over, 4.5 cents. In 1896, the minimum charge, which permitted the use of 3,000 cubic feet of water, was fixed at $5.00; and the meter rates ranged between 17 cents per 100 cubic feet and 4½ cents (the latter price for quantities upwards of 53,000 cubic feet). The charge for quantities between 28,000 and 40,000 was 6 cents. The present meter rates, which were established in 1898, range between 14 cents per 100 for quantities of 1,900 or less and 3½ cents for 57,100 cubic feet and upwards. The schedule rates remain about the same, or $5.00 for a water closet in a house, for faucet use, urinals, etc.; $3.00 for stable supply; $4.00 for bath tub in house, etc.

—or to follow a policy favorable to consumers rather than to taxpayers. It is the declared policy of the present mayor, however, to apply the earnings, as rapidly as the decreasing work of construction will allow, to the reduction of the amount which the city has to pay for water until that item is entirely saved to the taxpayers. It is doubtful, however, if he would go so far as to allow the works to earn a revenue for the city treasury.

INSURANCE RATES DECREASE.

Incidental to the subject of cost to the citizens, especially from the standpoint of taxpayers, and this item might also be set against any loss on account of taxes which a private company might pay, should be mentioned the lowering of the rate of insurance. After two years of the new service, the companies were induced by their patrons to reduce the minimum rate twenty per cent, which is estimated to secure a saving of about $150,000 per year, or more than enough to pay the interest on the bonded indebtedness. The rates had been raised under the old system owing to the inadequacy of the supply of water. This fact probably indicates more strongly than any other the great improvement under municipal ownership of the character of the service. Insurance companies do not lower rates for sentimental reasons.

A BUSINESSLIKE ADMINISTRATION.

Perhaps the most notable feature of the experiment has been the quality of the *personnel* of the department. This has made the conduct of affairs conservative, efficient, and—most important of all—non-partisan. So strong has been this spirit, that in the case of a partisan appointment to its membership, which was perhaps the only one made, the appointee directly became one of the most non-partisan and valuable members. Dean James B. Brooks, of the Syracuse University Law School, was a member of the Board from the date of its organization until its dissolution according to the provision of the White charter on January 1, 1900, having been also a member of the original commission. General D. H. Bruce, the president of the old company, was retained in the office of superintendent until he was relieved at his own request. Colonel J. G. Butler, secretary and treasurer of the old company, was made cashier under the city. Mr. Edward Noyes Westcott—author of "David Harum"—was in charge of the office force until his death. Mr. William R. Hill was appointed

superintendent and chief engineer, which position he held until his resignation at the beginning of the present year to accept the office of chief engineer of the New York Aqueduct Commission. To these men and to Mr. Croes and Mr. Howard Soule are due in a very large degree the success of municipal water works.[1]

Thus the experience of Syracuse shows that despite what opponents may say, it is possible to have a municipal civil service composed of the best men, in which the spoils idea has no foothold. What has been attained by foreign cities can be secured in American cities, yes, and has been in some instances. The results are beneficent to the highest degree. Mistakes have been made, but they have not been due to the spoils idea, and they tend to a minimum in the absence of political party influences, and in the absence of any petty local prejudices against the importation of skill from other cities.

To what good fortune of the city this is due, is doubtful. It may be chargeable simply to chance. It may be that the concentration of a lively public interest exercised a wholesome influence upon appointments to its membership and afforded a wholesome incentive to the members to put forth their best endeavors, indeed this seems very likely. The fact of a certain disposition to criticise the management of the "experiment in municipal socialism" at home and abroad may be noted as another wholesome element in the situation. Most other communities, however, might find similar conditions which would make for the successful launching of such an enterprise. No credit can be given to the general purity of the city politics, for the executive departments have generally been duly steeped in the spoils system, and the legislative branch seems to be usually and normally a vendible commodity, and neither better nor worse than the common run of such bodies in cities of this class.

Until January 1 of this year, the administration was in the hands of a non-partisan board. It has since been in the hands of a superintendent, appointed by the commissioner of public works, who in turn is appointed by the mayor. Whether the change is for good or for ill depends entirely upon the quality of the mayor and the attitude of public opinion. If the mayor appoints the right sort of a commissioner of public works, and if the two per-

[1] Mr. Cross, of New York, was the consulting engineer during the investigation stage, and Mr. Soule, of Syracuse, was consulting engineer, had charge of drawing the plans and supervised the work during construction.

mit a man of sound business sense to fill the office of superintendent, who manages the affairs in a businesslike way, always keeping the funds separate from the regular revenues of the city, the change may be for the better. The late board has had an exemplary career, but diffused authority is apt, in the long run, to be weak.[1]

On the other hand, a partisan administration, permeated by the spoil system, might make sad havoc of the works, for the salary list is elastic throughout and the civil service rules do not contain enough starch to interpose a serious barrier.[2]

As an incidental benefit might be mentioned the use of the day labor system of employment as opposed to the contract system, which, it is claimed, results in shorter hours of work and better wages to the employees, and in a decided saving in the cost of work done.[3]

The net results to the city and to the people of municipal ownership and operation may briefly be summarized. There has been a great improvement in the quality of the drinking water, in the supply for domestic and public uses, and in quantity of free water. Insurance rates have been reduced twenty per cent, and the prices charged to private consumers by nearly fifty per cent. The conditions of success have consisted in a careful preliminary examination of all problems by a wisely selected body of citizens, aided by highly qualified engineers, in the lively interest and consecrated service of the board of managers, in the consecutive service of individual members of the board, in the quality of the men employed, in the infrequent changes of the personnel, and perhaps more than anything else in the absence of the domination of party politics.

[1] The new order of things seems to be starting out in the right way. A non-partisan appointment was made to the office of superintendent to succeed Mr. Hill.

[2] Under the board of commissioners, employees were sometimes appointed by the board, but usually by the superintendent. The latter method was perhaps the best possible, as long as political considerations did not enter in, as they did not. The civil service law has been nominally in force since April 19, 1896, but the local board, upon requisitions being made, would instruct Mr. Hill to go ahead and employ the men as he chose. Directly after the beginning of the present regime 73 out of the 109 employees of the department were discharged on the score of holding positions without authority, save twenty, who were discharged on the score of economy. The men discharged on account of not having been examined, included clerks, inspectors, meter readers, foremen, watchmen and repairers. It will readily be seen how difficult it would be to enforce civil service rules in making such appointments in face of a hostile administration.

[3] On December 1st, 1896, Mr. Hill claimed to have saved by the use of the day labor system, as much as $2,000 on one piece of work amounting to $25,000.

HISTORY OF PUBLIC FRANCHISES IN NEW YORK CITY.

(BOROUGHS OF MANHATTAN AND THE BRONX.)

BY

GUSTAVUS MYERS.

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CHAPTER I.

COLONIAL CONDITIONS.

Under Dutch and English rule, franchises of every kind were guarded jealously. Such as were granted to private individuals were given grudgingly and often taken back. Communal interests were considered far superior to individual interests.[1]

WHARVES.

At first, wharves, piers and slips were built and owned privately. In 1655 Daniel Litschoe, a tavern-keeper, was authorized to build a dock on the Strand near the foot of Whitehall street, and similar grants were made to others as late as 1688.[2] The Dongan charter of 1686 gave to the city ample power to make wharves or docks extending to low water mark in all cases where land had not before been granted to private persons. Further power was given in 1691 to take the land under water, and ever since the city has pursued a systematic process of dockbuilding. At present about two-thirds of the docks and piers are owned by the municipality and leased to private parties. During 1898, a total revenue of $2,027,126.20 was derived, exclusive of rents from ferry companies using wharf property.

MARKETS.

Markets were controlled by the city from the very first. An ordinance of January 29, 1676, directed that one be built by the water side near the bridge and weigh-house, and exempted everyone from arrest for debt going to and returning from it.[3] The Dongan charter confirmed to the city the two market houses it had built, and the Montgomerie charter extended its power.

[1] Witness an ordinance adopted October 6, 1648, and January 15, 1658, by the directors and council, stating that as many large and spacious lots lay vacant and unimproved, being held in reserve by parties for their pleasure or profit who would not build thereon contrary to the intention and meaning of their High Mightinesses, the Directors of the privileged company, Lords and patroons of the province, as the first donors and grantors of those lots, it was ordered respectively that in case of non-compliance the lots would be turned over to those willing to build and that a yearly tax be imposed upon the owners of all lots which should remain unimproved. *The Records of New Amsterdam*, I: 13 and II: 361–363.

[2] *The Records of New Amsterdam*, I: 288.

[3] Hoffman, *Estates and Rights of the Corporation of New York*, I: 390.

Subsequently, leave was granted to various inhabitants to build market houses for "public benefit," upon payment of an annual rental. In November, 1731, the common council passed a law regulating markets,[1] and in 1735 assumed control of all markets, leasing stalls to individuals.

Since these early colonial times, new markets have been built and the old ones reconstructed and extended. Washington market was erected by the city in 1771, Catharine market in 1786, Fulton market in 1816, Centre market in 1817, Essex market in 1823, Clinton market in 1827, Tompkins market in 1829, Jefferson market in 1832, Union market in 1834, West Washington market in 1880, and Gansevoort market in 1884.

Even though the old and now inadequate system of markets has been supplanted largely by the thousands of private grocers and butchers, there has not been heard any public demand that the city sell the markets. One of the few discernible protests was made during the civil war when it was complained that the middlemen prevented farmers from coming directly to market and selling produce at first hand to the consumer owing to the fact that the latter had to pay 50 per cent more—a condition permitted by law.[2] The revenue from markets in 1879 was $284,659.85, in 1889, $336,458.32, in 1899, $248,393.95. The greater portion is consumed by maintenance charges.

FERRIES.

Ferries between Manhattan island and surrounding points originally were owned and operated by individuals. The city first assumed regulation and later ownership. On July 1, 1654, the director general and council adopted an order reciting that daily confusion prevailed among the ferrymen on Manhattan island, compelling the inhabitants to wait whole days before they could obtain a passage, and then not without danger and at an exorbitant price. It was ordered that no person should ferry from one side of the river to the other without a license from the magistrates, under the penalty of £1 Flemish for the first offense, £2 for the second and £3 with condemnation of the boat and corporal punishment for the third infraction of the order, "one-third to the ferryman, one-third to the fiscal, and one-third to the disposition of the judge."[3] At the same time rates were specified, hours prescribed, and certain persons exempted from tolls. On September 16, 1658,

[1] Hoffman, I: 391.
[2] Harper's New Monthly Magazine, 1862, XXV: 312.
[3] Hoffman, I: 278.

the burgomasters and schepens petitioned the director and council to take action looking to the receiving of ferry rent by the city.[1] In 1683, the city acquired all the rights of the Long Island ferry by consent of Governor Dongan and the council.[2] The Dongan charter confirmed this action and gave the mayor, aldermen and commonalty full power to establish and control other ferries and bridges.

In 1708, Cornelius Sebring solicited a grant for another ferry, "designing"—so read the resolutions of the common council of February 4—"to ruin the present one, which frames the chief income and support of the corporation." The common council's prayer to the governor that "such unreasonable and unjust application" be rejected was granted. In the same year, the city petitioned Governor Cornbury for a grant of land upon Nassau island, for the further convenience of the ferry, with power to establish one or more ferries, should there be occasion. The Cornbury charter granted the request, and section 37 ratified previous grants and reiterated that all ferries on both sides of the East river, then or thereafter to be established and erected around the Island of Manhattan, the management thereof, and all fees, ferriages and perquisites belonged to the city.

In 1691, the only ferry then existing was farmed out at public outcry to John Arrenston for seven years, at an annual rental of £14. The following year Arrenston complained that D. Lawser and others were making a daily practice of bringing over passengers and corn to his damage, and it was ordered that

no person beside the ferryman should bring any passengers, or corn, or any produce of the island from any place between the Red Hook and the Wallabout, under the penalty of twenty-one shillings for every offense; one-half to the ferryman, the other half to the informant.[3]

When money was needed in April, 1694, for the defense of the city, the sum of £200 was raised by mortgaging the ferry for three years. On February 2, 1698, another ordinance was passed regulating the rates, hours of running and duties of the ferryman, and down to 1717, the ferries were controlled exclusively by the common council. In that year, the general assembly assumed control so far as prescribing ferriage rates, penalties and like matters. The act also prohibited, except with authority from the city, the operation of a ferry from the city to Nassau island

under penalty of £50 for every such offense, with full costs of suit, one moiety thereof to his Majesty, his heirs and successors, and the other moiety thereof to such person or

[1] *The Records of New Amsterdam*, III: 14. [2] Hoffman, I: 274–275. [3] *Ibid.*, I: 276–278.

persons as shall prosecute and sue for the same, to effect, in any court of record within the said colony, wherein no protection or wager of law for more than one imparlance shall be allowed.[1]

WATER WORKS.

The question of securing pure water was agitated for many years in early New York.[2] The water in the public wells was brackish; the narrow width of the lower portion of the island did not permit sufficient filtration of the salt water. There were several wells in the vicinity of the Kalckhook pond,[3] however, which supplied good "tea-water," which was hawked about the streets by vendors. As the city grew, the necessity of a larger water supply became manifest, and the project was broached of sinking large wells and pumping the water into an extensive reservoir, from which it might be carried through the city in wooden pipes. The same spirit which dictated public ownership of wharves, markets and ferries demanded municipal water works. The people were entirely unwilling to delegate control to private individuals. The city authorities, therefore, in 1774, bought lands on an elevated hill near the present southeasterly corner of White street and Broadway, paying £600 an acre. This was many years before the territory thereabouts was cut into streets; what there was of Broadway was known as Great George street. Wooden pipes were laid through the streets; the first contract called for 60,000 feet at a cost of £1,250. The work was completed about April, 1776.[4] The occupancy of the city by the British during the Revolution and until 1783, disarranged the entire scheme of municipal government, the waterworks suffering with other city enterprises. The reservoir was probably not used by the city during that period.

Such remained the conditions until after the Revolution. The questions of owning public franchises most powerfully appealed to the inhabitants under Dutch and English rule. So strongly was the communal spirit developed among them that they placed not only ferries, wharves, markets, water works, vacant and waste land, and land under water, under city ownership, but took over also for the benefit of the community all rents, issues and profits arising from all rivers, creeks, caves, ponds, mines, minerals, fisheries, fowling and hunting within the city limits.

[1] Hoffman, I: 281 and II: 148–150.

[2] Valentine, *Manual of the City of New York*, 1865, p. 579.

[3] The Kalckhook, or "lime shell point," extended from a vale near the present line of Duane street, rising to an elevation of about fifty feet above the surrounding land. A pond of an acre spread on its summit.

[4] Valentine, *Manual*, 1865, p. 579.

CHAPTER II.

FERRY FRANCHISES.

After the Revolution, the colonial policy of ferry ownership and extension was carried out consistently. In 1789, 1801 and 1810, the legislature passed laws fixing rates of ferriage and forbidding competition with the city's ferry monoply. By 1811 steam as a motive power had come into use, and eventually displaced sails and horse-power. In that year, leases were granted for steam ferries to Hoboken and to Paulus Hook. Three years later Robert Fulton and William Cutting obtained a twenty-five year lease for a steam ferry between New York and Brooklyn, paying an annual rental of $4,000 for the first eighteen years, and $4,500 for the last seven.[1] In 1822, acting upon a complaint as to impositions, high charges and delays in the operation of the Fulton ferry, a select committee of the state senate found that notwithstanding the agreement, the company was frequently using its steamboats to tow ships about the harbor.[2] The legislature then passed an act requiring ferry masters or owners to pay a penalty of $5 for detaining passengers on the trip from the city to Nassau island longer than the time allowed by law, excepting in case of adverse winds, accidents or casualties.

PUBLIC AGITATION.

For many years the city authorities neglected to establish a ferry to South Brooklyn, though demanded by the rapidly increasing population. The poorer classes, chafing under high rents, complained bitterly. The Mechanics and the Equal Rights parties, important factors between 1829 and 1838, charged that a corrupt combination existed between a majority of the aldermen and certain powerful landlords, the latter believing that new

[1] The city, among other things, agreed to apply to the legislature for a law authorizing four-cent fares instead of two, on steam ferryboats. If the legislaturer efused to pass the act, the lessees were still to be permitted—so far as the corporation had power—to receive four cents. The increase was authorized in the case of the Fulton ferry; later the common council allowed all steamboats to charge the same. When the successors to the original lease sold it in 1836, it brought with boats and fixtures the sum of $100,000, though having only three years more to run.

[2] *Journal of the Senate*, 45th session, 1822, pp. 139 and 280-281.

ferries would divert the population to the cheaper districts of South Brooklyn and hence cut down rent in the city. The Equal Rights party particularly demanded a ferry to South Brooklyn and called for a state commission to establish new ferries and take the power out of the hands of the corrupt local officials. The establishment of South ferry resulted.

Another result of this agitation was the passing of an act by the legislature in 1845 which gave the governor power to appoint three commissioners who were authorized to grant licenses for establishing and keeping as many ferries, and at such places as in their opinion public convenience might require, between New York city and Long island; but it was expressly stated that no license was to be given which should interfere with the rights, franchises or privileges of the city, nor for a longer period than ten years—the customary as well as statutory period then and later. This commission established the Hamilton and Wall street ferries, which with the Fulton, Catherine and South ferries—all on the East river—were owned by the city, but leased to and operated by private parties.

Apparently, the city officials were very lax in securing the best terms from ferry lessees. A resolution offered in the City Convention of 1846 stated that some action ought to be taken to secure an increased and equitable revenue from the ferries, docks and slips belonging to the city.[1] This resolution was referred to a committee and smothered. On October 26, 1846, a petition with numerous signatures was presented to the convention complaining that passengers on the Staten Island ferry were compelled to submit to such schedules of hours, fares and freight "as suit the caprice or fancied interests of owners of said boats." The petitioners requested that in every lease of a dock or slip thereafter to be granted for ferry purposes, the power should always be reserved to the city to regulate the times of departure of boats and freight and other matters of convenience and accommodation.[2] The committee on ferries and franchises reported[3] that full power was vested in the common council to establish all necessary regulations.

CORRUPT GRANTS OF FRANCHISES.

The city had grown to such an extent by 1850 that there developed a fierce rivalry for the leases of existing ferries or of

[1] *Journal of the City Convention of 1846*, p. 49.
[2] *Ibid.*, pp. 449–451.
[3] *Ibid.*, pp. 567–568.

new ones to be established. How profitable ferries had become may be judged from the extreme readiness with which the applicants for franchises and wharf property either bribed or attempted to bribe members of the common council. The grand jury in its presentment of February 26, 1853, dealt with the leasing of ferries, and the appended testimony showed that the aldermen were making a regular traffic in awarding ferry leases to those who paid the largest bribe. For instance, in 1851, Dr. William Cockroft made an application for a lease of the Catherine street ferry. He had to pay, he testified, $500 to Assistant-Alderman W. Smith, to get favorable action, and like sums to other aldermen. After the passage of the grant Smith demanded $3,000 more, which Cockroft refused to pay.[1] In similar manner the lease of the Wall Street ferry was disposed of in 1852. Silas C. Herring swore that he with others was told that by paying a certain alderman $5,000 he could secure the lease—an offer declined by Herring. James B. Taylor, a rival applicant, was informed it would cost him $15,000 to get the resolution through. Taylor went to his associates, informed them of the price, and all agreed to subscribe equally to the bribery fund. Taylor then offered $10,000 for the ferry lease, but "Jake" Sharp on the same night offered $20,000 and secured the grant. Taylor likewise swore that he applied also for the Grand Street ferry lease. Rival applicants, however, paid a larger bribe, and obtained the grant, one alderman referring to the sum necessary to outbid Taylor, saying

> It was the damndest fight that ever was had in the common council; that it cost them [Sharp and his associates] to defeat it from $20,000 to $25,000.[2]

When the lease was granted to Sharp for an annual rental of $20,000, rent to begin October 1, 1853—fifteen months after the date of contract—, the city was receiving $1,400 a year from the Wall Street ferry. The common council's action in securing such an extraordinarily high sum as $20,000, was looked upon (about eight months before the grand jury findings were made public) as a remarkable instance of conserving the public interests. But before the time arrived for paying the rent, Sharp applied for a reduction. The common council thereupon reduced it seventy-five per cent, or $15,000 a year. The grant read that the ferry should be leased at an annual rent of $20,000, with power to regulate the same from time to time by the common council.

[1] *Documents of the Board of Aldermen*, XXI, part II: 1219.
[2] Document no. 55, pp. 1426-28.

Comptroller Flagg says:

The position given these words, following immediately after $30,000, looks as if they might have been introduced for the express purpose of enabling Sharp to get the franchise by a bid over all other competitors, expecting it would be reduced by those acting for the city. * * * Thus in one case the common council had been instrumental in abstracting or giving away, first $150,000 and then $1,600, out of a fund pledged to the public credits.

FERRY FRANCHISES VERY VALUABLE.

From sworn statements made by parties to the deals, one could quote instance after instance of corrupt grants,[1] but suffice it to say that from all the information available, it is clear that Sharp and the other bribe-givers did not think the several sums they had corruptly paid for their leases excessive. The ferries were productive of great fortunes. *The Wealth and Biography of the Wealthy Citizens of New York*[2] tells of one citizen in the first decades of the century who by a marriage and "that hourly source of accumulating wealth, the Fulton ferry steamboats established by him, became extremely rich."

The leases issued by the common council were granted for stipulated periods—usually ten years—and were supposed to contain provisions amply protecting public interests. As a matter of fact the rates and conditions were far more advantageous to the lessees. The schedule of the Grand Street Ferry Company to Williamsburg, 1859, permitted the company to charge:

For every foot passenger, 3 cents; commutation for a year, $10.00; for a man and horse, 12 cents; for a one-horse pleasure carriage, 25 cents; for a gig or sulky, 25 cents; for a two-horse pleasure carriage with four persons and driver, 37 cents; for a one-horse wagon (loaded), 25 cents; for the same light, 18 cents; for a two-horse wagon loaded, 37 cents; for the same light, 25 cents; for a two-horse wagon with hay or straw, 50 cents; for every steer, ox or cow, 12 cents; for every score of sheep or hogs, 75 cents; for every calf, 3 cents; for every dead hog weighing 100 pounds or under, 6 cents; for the same weighing over 100 pounds, 8 cents; for every 100 pounds of iron, butter, cheese, etc., 4 cents; for every barrel of cider, liquor or pork, 6 cents; for every milk wagon of one horse (commutation), per month, $4.00; for every barrel of flour, 4 cents. Some of the ferry companies were allowed to charge 4 cents for every passenger, but the freight rates of the different companies were about the same.[3]

Though these rates were considered excessive, the contracts were thought to contain provisions safeguarding the city's interests. The agreement with the Staten Island Ferry Company explicitly stated that the grant was "not to interfere with the right of the corporation to grant other ferries to and from Staten island, or to

[1] See Document no. 55 particularly. [2] Published at the *Sun* office in 1846.
[3] Valentine, *A Compilation of the Existing Ferry Leases and Railroad Grants*, compiled by order of the Common Council, 1866, p. 88.

and from any other place."[1] The company was to provide safe and convenient ferry houses and run boats as frequently as public convenience might require. The agreement with the Roosevelt Street Ferry Company prohibited it from subletting its lease, and that with the James Slip Ferry Company restricted its rates to the same as those of the Peck Slip Ferry Company.[2]

COUNCIL DEPRIVED OF POWER.

Public distrust of the common council was so pronounced, however, that an act vesting the power of leasing ferries in the commissioners of the sinking fund met with approval. The common council still had the right to establish new ferries, but they were leased by the comptroller under the direction of those commissioners. When in 1859 Grand street and Peck slip ferry leases were executed under this new arrangement, the common council declared that the sinking fund commissioners had no authority and announced that the leases granted were null and void. This resolution was adopted by both branches of the common council on the same day, but was vetoed by the mayor a fortnight later.[3] The resolution was then repassed by a two-thirds majority of both boards, but ineffectually.

The commissioners continued to act, and this plan gave more satisfaction.[4] Much better terms were secured. For instance in 1862, the Erie Railroad Ferry Company had seven boats, which carried 27,000 persons and two thousand vehicles daily, at three cents per head for each passenger and the usual rate for freight. Each boat made the passage in six minutes. Yet "for this privilege, the most valuable ferry of the city, the company only pays $5,000 per annum, holding it until the year 1866."[5] On the three ferries to Hoboken, the same writer says seven thousand persons had been known to travel on Sunday, yet the lessees "paid only $1,050 a year for the whole three ferries."[6]

In striking contrast with these franchises granted by the coun-

[1] Valentine, *Compilation*, etc., 1866, p. 13.

[2] *Ibid.*, p. 41. Some of these agreements were made by the board of estimate.

[3] *Documents of the Board of Aldermen*, 1860, no. 13.

[4] Over thirty years later, after many important street railway franchises had been given away by the council, this plan was first publicly broached and its merit over the prevailing one approved. In reply to a leading question, Walton Storms, chairman of the finance committee of the board of aldermen, said that all franchises ought be so disposed of. (Testimony taken before the Senate Committee on Cities, 1890, I: 583.) Under the new charter the board of estimate and apportionment have this power.

[5] J. W. Watson in Harpers, XXV: 811.

[6] *Ibid.*, 818.

cil, were the returns exacted by the board of estimate. The Peck Slip Ferry Company was required to pay $21,000 a year for the lease to Brooklyn—"a bargain," says Watson, "that endures to 1869," while the lease for the ferry from Grand street to Williamsburg annually paid $18,000 until the same year.[1] At this time New York city had over 700,000 population, Brooklyn 275,000 and Jersey City 50,000. Over the boats of the Union Ferry Company 40,000 persons were estimated to pass daily.

CITY PROFITS.

By 1866, the total annual rental to the city of all ferries was $181,230.[2] The ferries leased by the Union Ferry Company—the Hamilton avenue, Atlantic, Wall, Fulton and Catherine street ferries—paid $103,000 a year. Others produced almost nothing. The East Thirty-fourth street ferry yielded but $100 a year, the East Eighty-sixth street and the West Forty-second street ferries $50 each.[3] The opening of the Brooklyn Bridge for traffic May 24, 1883, reduced the receipts of some of the East River ferries and consequently the returns to the city. The five ferries of the Union Ferry Company, whose boats operated nearest the bridge, suffered most. This company, under its lease, was to pay 12½ per cent of the receipts, and for the year after the opening of the bridge, ending May 1, 1884, paid $126,971.09 against $145,225.75 in the previous year.[4]

By 1885 there were thirty ferries operating between Manhattan island and Long island, Staten island and New Jersey. Mayor Grace announced in his annual message

> that the city now derives an annual revenue from ferry rents of more than $300,000—a larger amount than has ever before been received.[5]

Under Mayor Grace's administration a number of new ferry leases were made at increased rentals. Thus, instead of leasing the North Shore Staten Island ferry for an annual lump sum, as was customary, it was sold to the Staten Island Rapid Transit Railroad Company at a rental of 14½ per cent of the gross receipts from ferriage. Mayor Grace triumphantly referred to this arrangement as one which probably would yield a yearly revenue of over $40,000, besides a rent of $10,000 a year from the wharf property belonging to

[1] Harpers, XXV: 823. [2] Valentine, *Compilation*, 1866.
[3] Valentine, *Compilation*, 1866. The Tweed "Ring" did not derive so much plunder from the disposition of the ferry leases as from other sources, for many leases had been made before it got full sway and expired after it was overthrown.
[4] *Proceedings of the Board of Aldermen*, Vol. CLXXVII. [5] *Ibid.*, 64–65.

the city at the foot of Whitehall street, the rent previously received being only $2,501 per annum.[1] Thus it was shown what additional revenue might be obtained if well-meaning men, intent on exacting the best terms for the city, were placed in office.

Under the Greater New York charter, the ferries are controlled by the dock department, though the board of estimate and apportionment grants all franchises. Nearly all the existing leases have been sold at public auction—some for a definite sum yearly, others for a percentage of gross receipts, and still others for both.[2] To give some idea of the success of this system and the rapid increase within the last quarter of a century, a few comparisons may be interesting. The lease of the West Twenty-third street ferry, operated by the Erie Railroad, which up to 1876 brought only $50 annually,[3] now pays to the city $11,840.91 a year —the franchise extending from December, 1897, to December, 1902. The Barclay street ferry to Hoboken, which up to 1875 yielded $1,100 yearly to the city,[4] now produces $20,104.25 annually. The Christopher street ferry, which until 1874 paid $800 yearly, now pays $22,500 a year under a lease dating from March, 1895, to March, 1905. Thirty years ago, the Debrosses street ferry rented until 1874 for $1,000 a year.[5] It now pays $7,200 a year. The Chambers street ferry, paying $9,300 rent yearly until 1874, now pays under a lease from May, 1897, to May 1, 1902, five per cent of the gross receipts (not less than $8,500).

These comparisons are very suggestive. Many of the old leases referred to were executed early in the sixties. Since that time the population and trade of New York, Jersey City, Hoboken, Brooklyn, Newark and all the neighboring towns, cities and villages have increased enormously. The business of the railroad companies, which own most of the North River ferry leases, has kept pace with the general increase, and an immense army of passen-

[1] *Proceedings of the Board of Aldermen*, CLXXVII : 65.

[2] In the majority of instances, it is not possible to determine what the city receives for ferry franchises separately from the rent for the wharf property used by the ferry company, since the two are usually offered together in the bids. In a few cases, however, the sums are kept distinct.

[3] *Manual of the Common Council*, 1870, p. 683. At the time this lease was executed and for some years later, the Erie Railroad was the all-powerful and dominant private corporation both in local and state politics. Laws conferring most valuable privileges and immunities were passed at its behest. The courts corruptly, as was proven in the case of Judge Barnard, decided in its favor. Tweed was a director in this company and added thereby largely to his wealth.

[4] *Manual of the Common Council*, 1870. [5] *Ibid.*

gers cross the river daily, to say nothing of the stream of freight traffic constantly pouring into and out of the city. No bridge has diverted traffic and the companies have had unobstructed sway.

FERRY STATISTICS—1899.

LOCATION.	EXPIRATION OF LEASE.	LENGTH OF LEASE IN YEARS.	RENTAL.	RENT OF WHARF PROPERTY IF GIVEN SEPARATELY.	RECEIVED, 1899.
NORTH RIVER.[1]					
Barclay St. to Hoboken..	March 1, 1905	10	$20,104.25		$20,104.24
Chambers St. to J. C. ...	May 1, 1902	5	5% G. R.[2] not less than $8,500.		8,553
Christopher St. to Hoboken	March 1, 1905	10	22,500		22,500
Cortlandt St. to J. C.. ...	May 1, 1908	10	11,000		11,000
Desbrosses St. to J. C.....	May 1, 1908	10	7,200		7,200
Jay St. to Weehawken...	April 1, 1902	5	3,500		3,500
Lib'ty St. to Communipaw	Dec. 21, 1902	5	10,000		10,000
S. of West 13th St. to J. C.	May 1, 1900	10	2,501		2,501
W. 42d St. to Weehawken	May 1, 1902	5	11,000		11,000
W. 14th St. to Hoboken..	March 1, 1905	10	8,584		8,584
W. 23d St. to Jersey City	Dec. 21, 1902	5	11,840.91		11,840.93
W. 23d St. to Jersey City	Jan. 1, 1906	10	5% G. R.	$22,500	25,233.90
W. 130th St. to Fort Lee..	June 1, 1905	10	3,000		3,000
EAST RIVER.					
E. Houston to Grand St., Brooklyn.....	May 1, 1908	10	9,500		9,500
E. 92d St. to Astoria.....	May 1, 1904	5	5% G. R. not less than $4,500.	700	6,9.7.41
E. 99th St. to College Point	Dec. 21, 1902	5	2,500		2,500
E. 10th St. to Greenpoint..	May 1, 1908	9yrs.9mo.	5,500		5,500
E. 34th St. to L. I. City...	May 1, 1908	10	12,000		12,000
E. 23d St. to B'way, Bklyn.	Extensive alterations at this point including the building of bulkhead wall will occasion a readjustment of rentals.				9,910.01
E. 23d St. to Greenpoint..					19,677.91
Grand St. to B'way, Bklyn.	May 1, 1899	10	15,000		15,000
Grand St. to Grand St., "	May 1, 1908	10	5,000		5 000
James Slip to L. I. City...	May 1, 1903	5	8,000		8,000
Pier 2 E. R. to So. Bklyn..	Dec. 21, 1902	5	5% G. R. not less than $7,000.	1	7,001
Pine St. to L. I. City.....	Dec. 21, 1899	10	5% G. R. not less than $500.		537.73
Roosevelt St. to Bklyn....	May 1, 1908	10	20,000		20,000
Catharine St. to Washington St, Brooklyn	May 1, 1901	8+	7¾% G. R.		$59,624.03 total receipts from Union Ferry Co.
Fulton St. to Fulton St., Bn.	May 1, 1901	7yrs.8mo.	7¾% G. R.		
Wall St. to Montague St., Brooklyn.....	May 1, 1901	7 +	7¾% G. R.		
Whitehall St. to Atlantic & Hamilton Ave., Bklyn.	May 1, 1901	7 +	7¾% G. R.		
Whitehall St. to S. I.....	June 1, 1904	10	5½% G. R. not less than $22,500.	21,500	44,282.32
Total.....				$44,701	$370,417.47

[1] All percentages of gross receipts include only the receipts on the New York side in case of ferries running to New Jersey.

[2] G. R.=Gross Receipts.

CHAPTER III.

WATER SUPPLY.

With the evacuation of the city by the British, the inhabitants resumed the consideration of local questions, and among the first was that of an adequate water supply. The old Kalckhook reservoir was little used; pumps and wells were mainly relied upon, water being retailed by bucket from door to door. In 1798, when Dr. Joseph Brown suggested the use of the Bronx waters, his idea was looked upon as exceedingly daring and original.[1] While it was being discussed more as a refreshing bit of audacity than as a serious suggestion, the Manhattan Company presented its project.

A PRIVATE COMPANY ESTABLISHED.

The Manhattan Company was a creature of Aaron Burr. In reality he was not so much concerned in supplying pure water to the people as in securing a bank charter. The Federalists controlled the only bank in New York, and as banks were then potent political factors, Burr sought to establish one for the Republican party, of which he was the New York city "boss." As it was difficult to get the legislature to charter a bank, Burr resorted to trickery. A bill was introduced apparently for the purpose of preventing yellow fever in New York city by providing for pure water. Believing this a benevolent object, the incorporation of the company was authorized, and there was no little surprise when it was learned that one section subtly drawn allowed the Manhattan Company to transact banking.[2] The same year this company obtained permission to use the old reservoir until it could be ascertained whether the water was sufficient in quality and quantity to supply the city. This the Manhattan Company soon abandoned and established its works near what is now the corner of Centre and Reade streets.

SERVICE INADEQUATE.

As might be expected of a company dominated by political and banking interests, the service was wholly inadequate to the city's needs. Sometimes for weeks in winter, the supply would

[1] Richards, *The Croton Aqueduct*, Harpers' Monthly Magazine, 1860, XXII : 19.
[2] Hammond, *Political History of the State of New York*, I : 129–130.

be wholly cut off. Frequent advertisements were inserted in the newspapers, wherein the company apologized to the public for its failure to distribute water and promised better service. The rich preferred to buy water of superior quality drawn from the tea-pump in Orange street, which was vended about in carts. There was nothing to prevent a fire from devouring the city, except a providential storm or the blowing up of buildings in its path. A most decided public clamor for *city* water works was manifested, but owing to the inefficiency and corruption of the successive boards of aldermen which plunged the city so deeply into debt, this and other public improvements were retarded.[1]

The need was so great that all sorts of schemes were presented. Dr. Brown's project was now viewed more favorably. About 1824, Canvas White, the city engineer, officially advised that the water of the Bronx, the Rye and neighboring ponds be piped to the city, estimating the cost at one and a half million dollars.[2] One enthusiast proposed to utilize the Hudson by building a great dam across the river, to change its salt water into fresh and to force it into reservoirs by cumbrous machinery.[3] Another argued that water ought to be brought from the Passaic, eighteen miles away.[4] The Bronx plan was the only one considered sufficiently practicable to be acted upon, and this was voted down by the council in 1831.[5]

A year later the cholera so devastated the city that grass grew in deserted streets once the busiest. The people soon became convinced that if the city had had a pure and adequate water supply, the terrible death record would have been greatly curtailed and perhaps the epidemic avoided. They demanded relief without delay. At the suggestion of Colonel De Witt Clinton, Jr., the Croton river was decided upon as the best source of water supply, and in February, 1833, the Croton water bill was passed by the legislature. On May 2, 1834, another law was enacted authorizing the building of the Croton dam, the aqueduct, High bridge and the receiving and distributing reservoirs. There were many unprogressives who bitterly opposed the plan

[1] Though superseded by the Croton water supply which was established a few years later, the Manhattan Company still maintains the original reservoir in order to enjoy the banking privileges conferred by the charter. This tank, made of English wrought iron, is enclosed in a building at the corner of Centre and Reade streets.

[2] Harpers', XXII: 19. [3] *Croton Aqueduct Report*, 1862, p. 110.

at first, but after the great fire of 1835, which destroyed property worth over $20,000,000 and which caused commercial ruin and private distress, there were few.

CROTON SYSTEM CONSTRUCTED.

The construction of the great aqueduct was begun in May, 1837, and by June 27, 1842, water was flowing into the receiving reservoir in Central park. On July 4, it was let into the Fifth avenue distributing reservoir, which now is being torn down to make way for the new public library. To express universal gratification a public celebration was held, cannon fired, bells rung, banquets given and public addresses made. On October 14, 1842, when the whole system was completed, a parade composed of representatives from all trades and professions marched through the streets headed by bands of music. The cost of the Croton system was about $9,000,000.[1]

With the growth of population extensions became necessary. Even prior to 1870, there were practically no storage reservoirs, and in that year the outlets of lakes Mahopac, Kirk, Glenida and Gilead, and Barrett's Pond were dammed up; in 1873 Boyd's Corners, and in 1878 the Middle Branch. Under the aqueduct commission, created by legislative enactment, the new aqueduct was begun in 1885 and finished in 1890. Various storage and distributing reservoirs have since been completed or are now in course of construction, the total expense up to June 30, 1899, being $39,390,147.42.[2] The Jerome Park reservoir, now being built, alone will cost $5,475,060 according to the contract price, and the new Croton dam will cost about $4,150,000. The total capacity of all the storage reservoirs in use in 1899 was 40,500,000,000 gallons.[3]

The sanitary protection of the water supply sources has also been looked after. An act passed in 1893 authorized the expenditure of $500,000 annually to acquire lands, buildings and water rights along the streams, and on the shores of reservoirs and lakes to prevent pollution.

BRONX SUPPLY IN PRIVATE HANDS.

Since the annexation of Morrisania, Fordham and West Farms in 1873, a large part of the Bronx borough has received its water supply from the New York and Westchester Water Company—a private corporation operating under contracts made by the town

[1] *Croton Aqueduct Report*, 1862. [2] *The City Record*, August 23, 1899.
[3] *Annual Report of the Department of Water Supply*, 1899, p. 153.

and village authorities which will not expire until 1905. Under Mayor Grant's administration, this company apparently obtained the right to supply Hart's island with water, but the contract was so deftly worded that it gave the company the right to lay its pipes and mains in every street, avenue and thoroughfare in the then or future city of New York. For this comprehensive franchise the company pays nothing whatever.

The service has been so poor that the commissioner of water supply denounces it as "entirely inadequate" and says he is constantly receiving complaints from people in that district of insufficient supply and pressure of water.[1]

There would have been a real water famine had not the city authorities come to the rescue and agreed to furnish 500,000 gallons of water a day for distribution through the company's mains, at the charge of one cent per 100 gallons. Commissioner Dalton declares that the existence of this company's franchises and contracts is a serious obstacle to the extension of the city's service in the Bronx district. It is generally believed that the New York and Westchester Water Company is not only willing to sell out to the city, but is coyly inviting an offer. Louis F. Haffen, President of the Borough of the Bronx, has stated that the company is not only bankrupt and its plant valueless, but that it is retailing the water furnished by the city at an advance of 100 per cent.

RAMAPO COMPANY—ITS POWERS.

Public attention was violently aroused in August, 1899, by the efforts of the Ramapo Water Company to foist upon the city a contract calling for payment from the city treasury of over $200,000,000 in annual installments of about $5,110,000, in return for at least 200,000,000 gallons a day at $70 per million gallons.[2]

The history of this company is the same as that of so many companies chartered by the legislature apparently for harmless or benevolent purposes, but which develop the most sinister designs, though cloaked under professions of serving the public. The charter of the Ramapo Water Company was granted by the legislature in 1895. In its original form, the measure was insignificant, but during legislative incubation, it came to confer

[1] *First Annual Report of the Department of Water Supply*, 1898, p. 11.

[2] *The City Record*, Aug. 28, 1899. There is not wanting evidence that this company once offered New York city water at $58 per million gallons, and that it offered Jersey City water at $25 per million gallons in 1898. The present water supply costs this city about $35 per million gallons, and it is retailed for $50 on an average. Thus under the Ramapo contract the city would lose over $20 per million gallons or be obliged to increase water rates.

the most comprehensive powers. The object of the company, as stated in its certificate of incorporation filed in 1887 and in the original bill in the legislature, was to acquire such lands and waters along the watershed of the Ramapo, Esopus and Housatonic rivers and their tributaries, as might be suitable for the purposes of accumulating and storing water. The company was also empowered to supply water for mining, domestic, manufacturing, municipal and agricultural purposes to cities, towns and villages and other corporations. It could lease its ponds, lakes and reservoirs for a term of years to any individual for ice-cutting purposes.

By the time the bill had been revised and passed, it gave absolute rights of condemnation in any watershed in the state; it empowered the company to lay pipes under all navigable waters in the state, and to supply water to any community in the state. These extraordinary powers, which had never before been given to any similar corporation, and which were to last for forty years, enable the company to stand in the way of any rival seeking to supply New York or Brooklyn with water. The company to whom these grants were made had assets, according to the affidavit of its president on February 2, 1897, "of at least the value of $5,000," yet it asserted its ability to supply 200,000,000 gallons of water daily, the supply to begin in 1902.

When it was learned that there was an attempt secretly to rush a contract through the board of public improvements for water supply which could be gotten for less than half the sum specified, there was general amazement. The plea was entered in behalf of the scheme that it would contribute to the permanent water supply of the city, and that the city needed more water. But the Ramapo Water Company "had not a single water shed, not a gallon of water, not a reservoir, not a pump, not a pipe."

Curiously enough at the identical time the claim of the Ramapo projectors was being put forth as to the city's insufficient water supply, a belated report of the commissioner of water supply, the very official of all officials who sought to make the contract with the Ramapo water company, was published in the *City Record*. This quarterly report showed that in the months of January, February and March, 1899, the rainfall was sufficient to fill all the reservoirs of the Croton water system, and that after the reservoirs were full, the water ran to waste over the Croton dam at the rate of 680,000,000 gallons a day, while the city's consumption of water was about 260,000,000 gallons daily. In other words, nearly twice

as much water as the city could use was allowed to run to waste. From the figures given in the report, it was evident that the Croton watershed can supply about three times as much water as the city needs, and that it will be unnecessary to tap an additional water supply for many years, even if the city grows to twice its present size. The sudden conversion of the commissioner of public supplies which led him to recommend the Ramapo scheme to the board of public improvements after he had penned this report was widely and pertinently commented upon.

PUBLIC OPINION OPPOSED TO CONTRACT.

The legality of the proposed contract was based on section 471 of the charter, which does not allow the commissioner of water supply to make any contract without the consent of the board of public improvements. But having secured this consent, the company thought a contract between them and the commissioner of public supplies would be legal. It was freely charged that some member of the charter commission, knowing of the proposed contract, smuggled in this section to provide for it. A noted lawyer, ex-Judge John F. Dillon, a member of the Greater New York charter commission, to whom Comptroller Coler, the foremost opponent of the attempted "grab," applied for an opinion, takes an opposite view. In declaring that in his opinion the proposed contract was illegal, Judge Dillon stated that instead of being a grant of power, section 471 is an express limitation upon the power of the water commissioner to make contracts. William C. De Witt, another member of the charter commission, also ridiculed the idea that the section in question was drawn to provide for the advantage or profit of any water company, and has said:

> The charter of Greater New York provides expressly for the ownership by the city of its own waterworks. I believe that the power granted in the charter on the city with the power of eminent domain and give it the right to go into court and acquire land and water rights anywhere in the state of New York. This method is prescribed in great detail in the charter, and the idea that it may be subverted by magnifying and distorting section 471 of the charter so as to allow the board of public improvements to contribute in any large degree to our permanent water supply, is preposterous. [1]

The Ramapo Water Company kept up for the most part a defiant attitude. Driven from one argument it took refuge behind another. Its president issued a long statement declaring that their project was undertaken only in obedience to public demand as expressed in memorials from fire insurance and other bodies, that public interest demanded an increased water supply, that the water

[1] Interview in the New York *Tribune*.

pressure in New York was lower than that of any other large city in the United States, and that the city could not afford to stand the fearful danger of a fire without adequate water service. These statements received instant and conclusive refutation. The president of one large fire insurance company, member of the New York board of fire underwriters, declared the statements sheer impertinence on the part of the Ramapo "ring." "It is an attempt," he said "to connect the name of a reputable organization with one of the biggest pieces of robbery ever devised." He denounced the Ramapo company, saying it owned nothing except what political "pull" basely applied and government dishonestly administered could give it.

What is more, the fire insurance companies are against private companies supplying the city with water. That is the curse of London to-day. New York is big, rich and competent enough to furnish its own water, and the day that will leave it to private companies to do it, will be a step backward in progressive government. This proposed Ramapo contract is a steal of the first magnitude.

Several injunctions were obtained from the courts restraining the board of public improvements from proceeding in the matter, and looking to the annulment of the Ramapo Water Company's charter.[1] A vigilance committee composed of a number of citizens was formed. A mass meeting was held in Cooper Union to protest against the awarding of the contract. Upon all sides it was looked upon as the hugest attempted design on the public treasury that the city had known. The fact has been fairly established that powerful and corrupt "bosses" of both parties were accessories if not principals in the scheme.

The Ramapo Water Company scheme met with such universal execration and threatened such political disaster that it was deemed wise to retreat. On August 30, 1899, a resolution was passed by the municipal assembly which read:

As the expressed principles of the present administration when seeking the suffrage of the people, were that the municipality should own and control all public utilities therein, * * it is not in the public interest nor for the public weal, nor is it necessary that the city should contract with a private corporation for its supply of water; that upon the expiration of the existing contracts for such purpose, proceedings should be taken to acquire the rights of the persons or corporations holding or owning any such rights to the end that the municipality shall own its own water system exclusively.

[1] On December 9, 1899, Judge Gildersleeve of the Supreme Court, in dismissing the injunction of the *World*, sustained the plaintiff's chief contention—that the board of public improvements had no power to make a binding contract with the Ramapo Water Company without concurrence of the municipal assembly and explicit certificate from the city comptroller as well as from the mayor. Another suit brought by the *Journal* to annul the charter of the Ramapo Company is under way.

CHAPTER IV.

GAS WORKS.

NEW YORK GAS COMPANY'S FRANCHISE.

The first company, the New York Gas Company, was incorporated by the legislature on March 26, 1823, with $1,000,000 capital. May 12, 1823, the board of aldermen granted this company the exclusive privilege for thirty years of laying their pipes in the streets of the city south of Grand street, which included for many years practically all of the city. The franchise was so immensely valuable that the board of aldermen was criticised severely for exacting no compensation. The only conditions imposed were that the company was to supply gas to the city at a yearly expense not exceeding that for the quality of oil then used (for street lamps); that the pipes were to be of cast-iron, and a few other like obligations.[1]

The giving of this franchise at a time when, above all, competition was thought to be "the life of trade" caused a great scandal. The Workingmen's party, which arose in great strength in 1829, and the Equal Rights or Anti-Monopolist party of 1834–37 protested vigorously against the granting of exclusive franchises, and the grievance formed one of their foremost planks. This agitation seems to have had effect, for in 1849, when the common council extended the franchise nineteen years from 1853, there is no evidence that exclusive privileges were continued. No compensation was exacted, but some minor conditions were inserted, the chief being that the city was to pay no more than $15 a year for each gas lamp. The price of gas to the ordinary consumer was, in 1825, $10 per thousand cubic feet.

MANHATTAN GASLIGHT COMPANY FORMED.

The company's business and profits grew as rapidly as the city increased in population and wealth. The large returns led to the formation of the Manhattan Gaslight Company with a capital of $500,000. It was organized to compete with its predecessor, but an amicable arrangement for division of territory was soon reached.

[1] MSS. Minutes of the Common Council, 48:59–60.

On May 8, 1833, the common council gave this company the privilege of laying pipes in all streets, avenues and public places north of Grand street and in the western part of Canal street, from river to river, for twenty years. No compensation for this privilege was demanded and, of course, none was offered. The principal condition attached was that the company should supply gas lamps to the city at an annual expense not to exceed $15 each. Owing to the agitation against exclusive franchises, there was nothing in the contract which prevented the city from granting to other parties the same right. The principal object of the city officials in the early gas contracts seems to have been to secure cheap street lamps and to compel the companies to establish their gas plants and reservoirs above Fourteenth street. They did not believe that New York city would creep up to that line before many years, and thus nullify their efforts to keep a "dangerous" business with obnoxious odors from built-up sections.

In 1847, the Manhattan Gaslight Company increased its stock to $1,000,000, and on May 5 of the following year made another contract with the city to last until May 5, 1868. The company was to have the right to lay pipes between Grand and Forty-second streets, river to river, and the city, among other things, reserved the right to order pipes laid on all streets within the awarded territory, provided it did not compel expenditure of more than $6,000 a year. This, as well as other grants made by the city, were not regarded by the aldermen as grants in perpetuity nor a basis for a claim of vested rights. They were distinctly termed "Articles of Agreement," and "Contracts," and drafted as such. That of 1848 explicitly stated that the city reserved the right to declare the contract null and void upon any violation of its terms.[1]

PRICES FORCED DOWN.

The advent of the Manhattan Gaslight Company reduced the price of gas to $7 per thousand. But the two companies enjoyed a complete monopoly of the field until 1858, for the Harlem Gaslight Company, though organized in 1855 restricted its operations to the scantily built district above Seventy-ninth street. Each of the two companies had its own territory, parcelled out by law and beyond the danger of invasion. So dissatisfied were the people with this status of affairs, that in 1849–1850 many joined a Gas

[1] *Documents of the Board of Aldermen* (from January to June, 1850), Vol. 28.

Consumer's Association, which demanded a city gas department for protection and public relief. The vigorous measures adopted scared the gaslight companies and brought down the price of gas from $7 to $3.50.[1]

So strong was the bitterness that in 1855 when the Manhattan Gaslight Company petitioned for permission to increase its capital stock to $4,000,000, the legislature yielded only on the condition that after one year from the date of the increase, gas should be sold at $2.50 per thousand feet. The company accepted this condition, but thereupon instituted a system of meter rents by which the price of gas was kept at $3.[2] In 1867 the legislature abolished meter rents, whereupon the company surrendered its old charter and reorganized under the general law which enabled it to override the popular will and charge $3.[3]

The opposition against unconditional franchises caused the insertion in the franchise of the Harlem Gaslight Company of a clause reserving the right on the part of the municipality to purchase its real estate and plant at any time upon payment of cost with ten per cent additional.[4]

COMPETITION CRUSHED OUT.

The Metropolitan Gas Light Company was organized in 1858 for the express purpose of securing a portion of the great profits enjoyed by the old companies. After a short period of competition with the Manhattan Gas Light Company, its operations were restricted by a mysterious but all powerful influence, to that part of the city between Thirty-fourth and Seventy-ninth streets. The two original companies thus continued to thrive on the rich territory they dominated—the thickly settled sections of the city.

The two companies were the strongest kind of powers socially,

[1] By 1855 the two companies manufactured 770,000 cubic feet of gas and had about 26,000 customers, yet the price of gas was higher in New York than the average price in twelve of the largest cities in the United States. In 1862, the Manhattan Company was doing the most business, having 30,000 customers, employing 1,500 men, owning 230 miles of cast iron pipe and making a thousand million cubic feet of gas annually. The New York Gas Light Company had 11,000 customers, 180 miles of pipe and yearly manufactured 600 million cubic feet of gas. The price of gas in various cities was as follows: Pittsburg had the lowest price, charging $1.80 per 1,000 feet, while in Auburn and Watertown, N. Y., Belfast, Me., and Charlotte, N. C., $7.00 was charged. Philadelphia charged $2.18; Chicago $3.50; Troy $3.60; St. Louis $3.50; Richmond, Va., $2.85, and New York $2.50. In London six shillings ($1.45) was charged. *Gas and Gas Making*, S. W. Watson, Harpers' New Monthly Magazine, XXVI: 18, and *Along the Docks*, XXV: 317.

[2] *Report of Special Senate Committee to Investigate the Supply of Gas in New York City*, 1885, p. 2. [3] *Ibid.* [4] *Ibid.*, p. 2.

financially and politically, shaping legislation to suit their own ends and defying the popular will and intent of the law. For instance, in 1862, when Congress levied a war tax of fifteen cents per thousand cubic feet of gas, various companies assumed the tax, the Peoria, Illinois, Gas Company not only doing so, but at the same time reducing the price to $1. The New York Gas Light Company, however, assessed the tax upon the consumers.[1]

AGITATION FOR CITY OWNERSHIP.

About this time an attempt was made to have the city take hold of the gas plants. On September 26, a resolution passed by the board of councilmen came up before the board of aldermen, the common council being composed of two branches. It directed the corporation counsel to draw up a transfer of all the rights and privileges of the Manhattan and New York gas companies to the corporation of the city of New York. Alderman Farley said that the gas companies had been charging the citizens 10, 20 and 25 per cent as they pleased. From the debate it is evident that the city officials held excessive charges to be a just ground for demanding that the rights granted to companies revert to the city. The resolution was referred to a sub-committee and suppressed.

OTHER FRANCHISES GRANTED.

In June, 1863, a company calling itself the Anthracite Gas-lighting and Heating Company obtained permission from the board of aldermen to lay pipes in every street and public place in the city for a period of fifty years. Though realizing the excessive profits derived from the manufacture and sale of gas and the consequently great value of this franchise, the only condition exacted was that the company restore the streets opened to the same condition as before.[2] Mayor Opdyke vetoed the resolution but it was quickly re-passed by two-thirds of both branches.[3] The common council of 1865 was fully as complaisant, for it gave the New York City Gas Company the right to use all the streets and public places for fifty years on the same condition.[4] Mayor Gunther approved this resolution. In neither case was compensation offered or asked.

It was a customary proceeding for companies composed of in-

[1] *A Review of Old Contests on Gas*, N. Y. Tribune, 1884.
[2] *Proceedings of the Board of Aldermen*, XC: 750.
[3] *Ibid.*, XCI: 474. [4] *Ibid.*, XCVIII: 486.

fluential men sharing prospective spoils with politicians or for the politicians themselves acting through dummies to organize companies dealing with public utilities without the remotest prospect of ever engaging in active business operations. Their one aim was to sell the franchises, so freely conferred, at a stiff price to some company that did seek to do business legitimately but which found the ruling powers unmoved by all arguments when it made application for a franchise. Thus the concern styling itself the New York Anthracite Gas-lighting and Heating Company did practically nothing for eight years and sold its franchise in November, 1871, to the Union Gaslight Company.

In 1866, another company, the Mutual Gaslight Company, was organized with a capital of $500,000, increased to $5,000,000 in 1870, of which only 50 per cent was paid in.[1] For a while this company could not persuade the alderman that another gas company would be beneficial, but finally, on April 27, a resolution granting a franchise was rushed through both branches and approved by Mayor Hoffman three days later. This franchise was to run for thirty years and allowed the company to lay pipes in streets and public places wherever it pleased, the only condition being vague and slippery, viz., "to be subject to the same restrictions as to the mode of laying down said conductors as apply to and govern the New York and Manhattan companies in that respect."[2]

CITY DEFRAUDED BY TWEED RING.

In the third quarter of the present century, the corruption prevalent in all lines of municipal politics appeared also in the payments for public lighting. In December, 1864, the common council allowed the Manhattan Gas Company to terminate its contract with the city. The contracts with the Metropolitan and Harlem gas companies had expired previously. On January 26, 1865, the Manhattan Gaslight Company gave written notice to the street commissioner that from January 10 of that year, it would claim and require $53 per annum for each street lamp lighted. The New York, Metropolitan and Harlem companies had given similar notice the previous year. This united action to despoil the city was too much for the authorities; even they could not stomach this audacity, and flatly refused to recognize the claims.

[1] *Report of Special Senate Committee*, 1885, pp. 3-4.

[2] *Proceedings of the Board of Aldermen*, CX:143.

Two years later the Tweed "Ring" was more thoroughly in possession of the city and every office from the supreme court down was filled with corrupt men. The superior court and the court of appeals rendered a decision in favor of the Harlem Gaslight Company in 1866, and the city authorities, waiting for such an excuse, paid the claims of all the gas light companies and continued to pay at the rate of $53 per lamp until January, 1872. With the installation of the reform administration, the gas companies were forced to abandon their claims.

Thus, it was clearly shown that the original contracts which were thought to benefit the city to some slight extent were of no value at all. The city fathers had planned to have street lamps supplied at $15 per annum; but both by decision of court and by consent of, if not collusion with, rogues in office the city was defrauded. At every point the gas companies worsted the public. They traded a mere pittance—$15 for each street lamp—for invaluable franchises, and then made the city sing its own song. "That," said a committee of aldermen in 1887, "was simply protecting the corporate interests of the city at the expense of the corporators—saving a few thousand dollars to the city treasury and affording, at the same time an opportunity to extort hundreds of thousands from our own citizens."[1]

The existence of corruption was so generally believed in and the abuses were so great, that a strong conviction again grew up that the city ought to own and operate its own gas works. The board of assistant aldermen was asked to petition the legislature to empower the city to supply its citizens with gas at cost.[2] But this memorial was referred to the committee on lamps and gas and not heard of again, the same as in 1862.

EVASION OF STATUTES.

The Municipal Gas Light Company came into the field in 1876 with a capital of $500,000, which by 1880 had been increased to $3,000,000.[3] In the same year, the Knickerbocker Gas Light Com-

[1] *Proceedings of the Board of Aldermen*, CLXXXVI: 477. Numerous other ways were found of defrauding the city; for example: "There are miles of these avenues," stated Comptroller Andrew H. Green in his report of September, 1874, "that have been in the last three years, worked in the most wasteful and extravagant manner at a cost of $600,000 or $700,000 a mile, upon which there is not a house in a quarter of a mileor a traveler once in half an hour and that are lighted at public expense far more brilliantly and expensively than Broadway below Grace Church."

[2] *Proceedings of the Board of Assistant Aldermen*, CXXV: 260-261.

[3] *Report of Senate Committee*, 1885, p. 3.

pany was organized, buying its franchise from the Union Gas Light Company, which was then in the hands of a receiver. Even with the entrance of these companies and the consequent increased competition, profits were still considerable. The Knickerbocker Company paid its president a salary of $500,000 a year.[1] An expert reported that the net earnings of the Mutual Gas Light Company were largely in excess of $500,000 a year or ten per cent upon its nominal capital stock. The original purpose of this company was that stockholders and consumers should derive equal benefits from any decrease in the cost of the manufacture. Whenever the profits, after deducting all necessary expenses and outlays, were to exceed in any one year the sum of ten per cent upon the whole capital stock, all above ten per cent were to be shared with the consumers. This sounded alluring and philanthropic; but the committee found that $1,500,000 in bonds had been delivered to the stockholders and that the consumers would get no benefit until these bonds were paid. "Therefore," stated the committee, "this issue of bonds seems to have been intended to defeat the beneficial purposes of the law."

GAS WAR LEADS TO POOL.

In the years immediately previous to 1880, the gas companies competed sharply. Some of them had agreements, which were seldom kept, not to invade another's territory. On August 26, 1878, the Knickerbocker Gas Light Company reduced the price of gas to $2 per thousand in defiance of the Municipal Gas Light Company. A gas war resulted and at one time the price fell to seventy-five cents per thousand. Two years later the Knickerbocker was absorbed by the Manhattan company.[2] The same year—1880, all the gas companies formed a combination and fixed the price to all private consumers at $2.25 per thousand cubic feet. They decided that no competing mains should be laid and that in all sales the sum of $1.25 per one thousand cubic feet should be set apart as a general pool, to be divided every three months, under the directions of a committee appointed for that purpose, in the proportion of the actual sales made by each company. Canvassing and soliciting were barred.[4] This combination was highly satisfactory to the companies but not to the people.

[1] *Report of the Special Senate Committee*, 1885, Appendix G, p. 123.
[2] *Ibid*, 1885, p. 4. [3] *Ibid.*, Appendix G, pp. 121-124.
[4] The companies supplying gas in what is now the Bronx borough—the Central, the Northern and the Yonkers Gas Light Companies—were, of course, not included in the pool.

EQUITABLE GAS LIGHT CO.

The prospect of profit was so great that another company—the Equitable Gas Light Company—was started in 1882. The other companies saw that in order to make the combination thoroughly effective they must shut out possible rivals by legal ordinance. The pool, therefore, brought influence to bear upon the board of aldermen to repeal the ordinance permitting all gas companies to lay pipes in the streets upon securing the consent of the mayor, the comptroller and the commissioner of public works.[1] The repeal was passed, and vetoed by Mayor Grace December 26, 1882.[2] Referring to the pool, the mayor stated that the furnishing of gas by the Equitable Gas Light Company would have the effect of making competition possible, that company having agreed to furnish gas to the million odd inhabitants of the city at $1.75, as against $2.25 charged by the companies in the pool. The mayor's veto killed the scheme.

In obtaining its franchise, the Equitable agreed to pay twenty cents for every lineal foot of trench opened for mains; to furnish gas lamps to the city at $12 each per year or less if the decrease in the cost of manufacture warranted it; to supply gas to city buildings at a rate not to exceed $1.50 per thousand cubic feet, and to consumers at not less than $1.75, and various other provisions beneficial to the community.[3] This was the first franchise to a gaslight company requiring direct compensation to the city or fixing the maximum price of gas to be delivered to consumers. Mayor Grace, under whose administration it was made, was credited with having done a signal service to the community.

The Equitable Gas Light Company began supplying gas in and 1884 forced down the price of gas in certain districts to $1.75. But the pool controlled the major portion of the city and there still charged $2.25.

CONSOLIDATION OF COMPANIES.

The same year the Consolidated Gas Company, embracing the New York, Manhattan, Mutual, Harlem, Metropolitan, Municipal and Knickerbocker gaslight companies, was formed with a nominal capital of $45,000,000. In 1885 public indignation at the extortion

[1] *Proceedings of the Board of Aldermen*, CLXVIII: 1095–1096.

[2] *Ibid.*, 1296-1297.

[3] See Exhibit G, Report of Superintendent of Lamps and Gas—*Special Senate Committee Report*, 1885, pp. 99–104.

of these companies crystallized. An association was formed and an appeal made to the legislature for relief. A committee from the state senate, known as the "Thomas Committee," was appointed to investigate. The committee's report disclosed a huge watering of stock on the part of nearly every New York gas company. Although the Knickerbocker Company claimed $3,104,000 capital, there was nothing to show what capital it actually had. The records of the tax department demonstrated that the company had been paying taxes on only a small proportion of the total with which it was credited.[1] The committee stated "to be eminently fair" that the companies in the Consolidated Gas Company represented less than $20,000,000 of actual investment.[2] The Mutual Gas Light Company withdrew before final consolidation, which reduced the total alleged capital of the companies to $39,078,000. As the Consolidated Gas Company had assumed certain liabilities of the individual companies, its alleged net capital was reduced to $35,430,060, as nearly as the Thomas Committee could ascertain. Hence, accepting this very liberal reduction, over $15,000,000 of the capital claimed was fictitious, and yet the company thereafter paid dividends on this amount. The various franchises and rights of the different companies were valued by the pool itself at $7,781,000.[3] For these franchises the companies did not pay and never had paid anything to the city.

PROFITS ENORMOUS.

It was also brought out by expert testimony before the committee that the cost of manufacturing gas was only forty-six cents per thousand feet. It was adduced that the Manhattan Gaslight Company, which for a long time sold gas at seventy-five cents a thousand feet, had been paying dividends of ten per cent and accumulating a surplus. Further, it was shown that the companies, in addition to the cost of gas and ten per cent dividends on their nominal capital, had been paid during the preceding ten years about $9,000,000 by the gas consumers of New York city. "It appears," were the committee's own words, "that during the last ten years, in addition to the cost of gas and ten per cent on the share of a nominal capital of the companies named, there has been paid by the consumers of the city of New York, $9,000,000.

[1] *Report of the Special Senate Committee*, 1885, pp. 8–9.
[2] *Ibid.*, p. 12. [3] *Ibid.*, p. 7.

If these ten per cent dividends should be calculated upon the capital actually paid in by the stockholders, it would appear that the gas consumers in ten years have not only contributed such dividend, but a further amount sufficient, in fact, to nearly duplicate the present system of gas supply."[1] The committee added that the gross sum paid for the ten years previous by the gas consumers in the city of New York to the companies, irrespective of any other source of income to them, was $74,656,884.67. "Of this amount nearly one-half was clear profit, viz: $30,074,715.27."[2]

LEGISLATURE REDUCES PRICES.

The result of the senate committee's investigation and the startling facts brought out was the introduction of a bill reducing the price of gas in New York city to $1.50 a thousand feet. And it is significant of the methods of the gaslight companies that after the bill had been advanced to a third reading in the assembly by a vote of 105 to 1, two days later it was defeated by a vote of 64 to 52. Charges of bribery were made freely, though never formally proved. It was declared that New York and Brooklyn members were paid $2,000 and $1,500 each to vote against the bill, while the country members were "rated" at $1,000 each. The following year—1886, the companies were not so fortunate. The price was reduced by law from $1.75 to $1.25 a thousand feet. This relief measure quieted public agitation for ten years.

COMPETITION LEADS TO COMBINATION.

In the meantime new gaslight companies sprang up. The Standard Gas Light Company obtained the most valuable rights from the legislature under reiterated charges of corruption. The East River Gas Company obtained a franchise in 1894 to lay mains in the city streets, and to build a tunnel under the East river to convey gas from its works at Ravenswood.[3] For this franchise the company was required to pay three per cent of its gross receipts to the city.

The advent of these companies resulted in the gridironing of the streets with pipes by rival forces. Ostensibly they were competitors; but in the essential matter of price, they in reality had a

[1] *Report of the Special Senate Committee*, 1885, p. 11.

[2] *Ibid.*, p. 12.

[3] This tunnel has been built large enough not only to hold large gas mains but to permit the operating of freight cars.

tacit compact not to sell gas less than $1.25 per thousand feet. Yet in spite of this semi-combination, the public derived some benefit. In order to gain additional custom and diminish that of rivals, each company employed numerous agents to scour the city and offer inducements to gas consumers. The companies gratuitously put up gas ranges in houses and stores, and made pipe connections free of cost to the consumer. In the rush for "business," the companies even competed for the favor of plumbers and builders in order to secure the advantage of connections in new houses.

Whatever good the gas consumers derived from this fierce competition was wiped out in November, 1896, when the gas companies formed a huge combination not only to keep up the price to $1.25, but to cease all expensive rivalry. The thousands of agents who had been employed to solicit custom were discharged, and the decree went forth that consumers thereafter would have to pay for such gas ranges or inside pipe connections as they wanted. The city was parcelled out among the different companies, and no subscribing company was to transgress upon other districts. Hence the gas consumer found it useless to protest if dissatisfied with the service.

PRICE REDUCED BY LEGISLATURE.

The formation of this combination re-awakened public interest and stirred agitation. The discharged employees held a mass-meeting in Cooper Union, December 31, to advocate the ownership of gas by the city. "It is notorious," ran one clause of the resolutions, "that the present cost of supplying gas is at most one-third of the amount charged the consumers." Early in 1897 a bill was introduced in the legislature compelling the companies to reduce the price to $1.00. This the companies fought with their usual bitterness. The covert threat was made that if the bill became a law the people would get a $1.00 quality of gas—in other words, an inferior quality. At the hearing before the legislative committee on February 4, Senator Cantor—the framer of the bills—said that there had been no legislation otherwise than friendly to the companies since 1886; that if an investigation were made, it would be found that gas bills at $1.25 were higher than when at $1.75; and he further pointed out the fact that since the passage of the 1886 bill there had been a great increase in population.

At the same hearing Henry M. Cross, who had made a special study of the gas question, presented figures showing that the

companies in the Consolidated Gas Company had a paid up capital of $11,000,000. This had been increased from earnings to $17,000,000 and had been watered to $37,775,000. "Since their organization," stated Mr. Cross, "these companies have paid $57,000,000 in dividends, an excess of $28,000,000 over ten per cent profit. The investors have had returned to them more than two and one-half times the amount of their investment and moreover have been given over $37,000,000 in stock which now is paying a dividend of eight per cent." Mr. Cross said that the New York gaslight companies were selling about twelve billion cubic feet of gas annually, and he estimated the cost of the manufacture of gas at 30 cents per thousand feet, the cost of its distribution at 15 cents, renewals and extensions at 10 cents and allowed 5 cents extra, bringing the entire cost to 60 cents. Prof. Edward W. Bemis thought 50 cents was a reasonable estimate of the cost of gas and was satisfied that gas could be produced at a good profit at 75 cents.

Meanwhile, a bill had actually been introduced in the legislature providing for 75-cent gas, though there were general doubts of the good faith of its backers. The legislature finally passed a bill compelling the gas companies to reduce the price of gas to $1 a thousand feet, within five years, at a yearly reduction of five cents.

RECENT DEVELOPMENTS.

Within the last few years the exploitation of gas franchises has continued as usual. In 1896, the Consumers' Fuel, Gas, Heat and Power Company attempted to secure a franchise to supply the city with fuel gas. The company pretended that the masses paid seventy to seventy-five per cent more for fuel gas than it would guarantee to furnish the same for. The board of aldermen granted the desired permission to open the streets of the city, merely compelling the company to pay $15,000 as a guarantee that it would begin work, with a few other minor conditions.[1] The public outcry was strong and instant. One public official declared the franchise to be worth $50,000,000. Yielding to public denunciation, the board of aldermen withdrew the resolution.

In January, 1898, the Equitable Gas Light Company and the East River Gas Company consolidated under the name of the New Amsterdam Gas Company. Since then the Equitable company has

[1] *Proceedings of the Board of Aldermen*, CCXXIV: 706-7.

laid no new pipes and consequently has paid nothing to the city. Of all the gas companies using the streets for mains since 1823, the Equitable is the only one that has paid anything for this privilege, and from the time it first began laying mains in 1884 until January, 1898, it paid only $166,371.17, or less than $12,000 per year.[1] Since consolidation, the Equitable and East River companies have used their pipes and mains mutually. The New Amsterdam Gas Company claims that the East River Gas Company is using only thirty-two per cent of its own mains and that it is willing to pay the three per cent of the gross receipts required by the original charter on that basis. Thus for the year ending September 30, 1899, it seeks to pay $15,181.19 as against $21,583.29 for the previous year. The city officials believe that the city ought to get $25,000 or $30,000 a year and the corporation counsel has advised a suit.[2] The gross receipts, according to the company's report, fell from $724,623.59 in 1897 to $506,039.75 in 1899. The East River Company is the only one required to pay the city a percentage of its gross receipts.

LATE GAS WAR.

During 1899 and up to March, 1900, there has been another "rate war" between the Consolidated, Standard and New Amsterdam gas companies, due to the design, so it is reported, of the Consolidated to get control of the Standard. The price of gas has been cut down as low as 50, 55 and 65 cents per thousand cubic feet. The New Amsterdam company, asserting the low price was driving it into bankruptcy, raised its price to $1.10, but the other companies did not follow. Upon the rumor that all the companies intended raising their prices to $1.10, the municipal council in November, 1899, passed resolutions favoring an act compelling the companies to reduce the price to 75 cents per thousand.

The most recent phase of this "war" is the acquisition by the consolidated company of the Greater New York Gas and Electric Light, Heat and Power Company, which in turn controls all the electric light companies except one and its tributaries, and also the subway companies.[3]

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[1] Statement of Bureau of City Revenue.

[2] *Ibid.*

[3] See Chapter on CONDUITS AND SUBWAYS.

ASTORIA GRANT.

The Astoria gas bill closes the chapter. In brief, it authorized the Astoria Light, Heat and Power Company to build a tunnel under the East river, in order to connect works which it purposes to build on Long Island, with pipes on the New York side. The advocates of the bill said, when it was introduced in the legislature, that it was framed on the same lines as the bill which gave the same right to the East River Gas Company. Its opponents, however, insisted that while authorizing one of the most audacious steals of a public franchise ever attempted, it was at the same time so worded as to deprive the people forever of any redress. Sixteen acres of redeemable land under water were given to the company; the streets were turned over to it in perpetuity; no offer was made to give cheaper rates for gas; while it could acquire for its own purposes any land it might see fit to acquire. As it passed the assembly originally, the bill provided for no compensation to the city. At Governor Roosevelt's request, a special clause providing for a three per cent payment was inserted. Even in this form the bill was bitterly attacked, as giving away a franchise worth millions of dollars.

By the vote of the Democratic members of the senate, the bill was defeated. The charge was made in the political campaign of 1899 by Assemblyman Mazet, that Andrew Freedman, a bosom friend of Richard Croker, head of Tammany Hall, proposed to the officers of the Consolidated Gas Company, which stood back of the bill, that if they would buy of him 15,000 shares of New Amsterdam Gas Company stock, at $50 a share, all opposition on the part of the Tammany members would cease. As the stock was then selling on the market at from $30 to $40 a share, the company declined. Later, so Mr. Mazet alleged, Mr. Croker offered to have the bill passed, if the company bought 8,000 shares at $50 a share—an offer likewise declined. These charges of blackmail were denied by Mr. Croker under oath. In December, 1899, the state land board sold the coveted sixteen acres of land under water at Astoria for $3,506, which the corporation counsel asserts are worth $3,000,000.[1]

[1] Personal letter to Gov. Roosevelt.

CHAPTER V.

STREET RAILWAYS.

NEW YORK AND HARLEM RAILROAD.

The first franchise granted to a railroad was given to the New York and Harlem Railroad Company in 1832. By the articles of agreement between the company and the mayor, aldermen and commonalty, the company was permitted to lay down a single or double track or railroad on Fourth avenue from Twenty-third street to the Harlem river, and a branch along One Hundred and Twenty-fifth street from Fourth avenue to Hudson river.[1] There was no time limitation to this grant; it was in effect exclusive, indefinite and perpetual. Section three of the contract expressly reserved to the city the right to regulate the power used for propulsion and the speed. Section two of the contract ordained that if it shall appear to the mayor, aldermen and commonalty that the railway or any part of it shall constitute an obstruction or impediment to the future regulation of the city or the ordinary use of any street or avenue (of which the mayor, aldermen and commonalty shall be the sole judges), the railroad company shall, on the requisition of the mayor, aldermen and commonalty, forthwith provide a remedy for the same satisfactory to the said officials and commonalty. If the company fail to find such remedy, they shall within one month proceed to remove such railway or obstruction, and to replace the street in good condition. Should the road decline or neglect to obey, the city officials may cause the obstruction to be removed, and the avenues or streets restored at the expense of the railroad company. This stipulation, it was thought, safeguarded the city's interests against possible abuse. Between 1829 and 1837 the opposition to exclusive franchises was notably strong.

Another section was inserted later which empowered the mayor, aldermen and commonalty to extend the company's road along Fourth avenue to Fourteenth street and through such other streets as the mayor, aldermen and commonalty might from

[1] This road, it need hardly be said, was never built.

time to time permit. The last clause of this section, though apparently harmless, was full of latent mischief, and one which caused in later years much trouble and confusion.[1]

The final section, as passed by both branches of the common council on January 30, 1832, and signed by the mayor on February 1, authorized the company "to take possession of the ground owned by the common council over which the line of railroad is ordered to be constructed," and which was to revert to the city when it ceased to be used for that purpose.

The community as a whole was unanimously in favor of the railroad. The only means of travel, apart from the water routes, were the slow stages, often over bad roads and frequently attended with much delay. The change was welcomed even by the Mechanics and Anti-Monopolist parties, which protested against the granting of exclusive franchises.

WEST STREET AND ELEVENTH AVENUE.

In 1847 the next important railroad franchise was granted. A resolution approved May 6 by Mayor Brady gave the Hudson River Railroad Company permission to construct a double track along the line of the Hudson river from Spuyten Duyvil creek to near Sixty-eighth street, occupying so much of Twelfth avenue as lies along the shore; then down Eleventh avenue to about Thirty-second street; thence across to Tenth avenue, down to West street, and on that street to Canal street. The chief conditions were that the company was to grade, pave and keep in repair a space twenty-five feet in width in and about the tracks, "whenever the common council shall deem the interests of the public to require such pavement to be done." The company was obligated to construct stone bridges across intersecting streets at its own cost, and to be at all times subject to regulations prescribed by the common council; and passengers were not to be carried below Thirty-second street.[2]

For the next twenty years, these two railroads—the only two that ever got a foothold in New York city—made no applications for franchises for steam roads.

In 1866, the council passed a resolution granting to the New York and Harlem Railroad Company the right to lay a double track

[1] *Documents of the Board of Aldermen*, 1860, Document no. 18. [2] *Ibid.*

for the purpose of running locomotives with freight trains through One Hundred and Twenty-fifth street, St. Nicholas avenue and Manhattan street, crossing what were then termed "all the grand Boulevards." Mayor Hoffman vetoed the resolution. The aldermen intimated that they intended to pass it over the mayor's veto, and the property holders of the neighborhoods affected met at the Adriatic hotel, Eighth avenue and One Hundred and Twenty-fifth street, on the evening of June 27, "to protest against the infamous scheme." One Hundred and Twenty-fifth street was then considered the great avenue north of Central park. It had been laid out at great expense by the city, and was viewed with pride by the residents of Harlem. The opposition was so unanimous that the aldermen did not re-pass the resolution.

FIRST STREET RAILWAY.

The first street railway grew out of the New York and Harlem Railroad Company's attempt to reach further down town than Twenty-third street. The common council in May, 1832, gave permission to the company to extend its tracks south of Prince street, through Union place, Bloomingdale Road and Broadway. The company was allowed to charge for carrying passengers below Twenty-third street a rate to be prescribed by the council, and was compelled to keep the streets in good repair.[1] On May 20, the company was permitted to continue its rails to Walker street; in April, 1838, from the Bowery to Broome street, to Centre street, to Chatham street; and on February 6, 1851, it was allowed to lay rails to the southerly end of the Park (now Park Row). Alderman Oakley unsuccessfully tried to have the board vote a three-cent fare from the City Hall to Third street.[2] So, bit by bit, was obtained the franchise upon which the present Fourth avenue surface line operates. Although owned by the same company, the line below Twenty-third street was virtually a distinct line, charging a different fare from the railroad rate.

In December, 1844, the common council requested the New York and Harlem Railroad Company to discontinue the use of steam power below Thirty-second street, and in December, 1854, the same body ordered the New York and Harlem Railroad Company, and the New York and New Haven Railroad Company to discontinue the use of steam power below Forty-second street on

[1] *Proceedings of the Board of Aldermen*, II: 419 and 450. [2] *Ibid.*, XLI: 1389.

Fourth avenue, within eighteen months. The result of this action was the compulsory running of a street car line from the Astor House to Forty-second street.

But this was not accomplished without much opposition. In February, 1858, a resolution, passed by the common council and approved by the mayor, recited that the New York and Harlem Railroad had

> failed to coerce the common council in repealing the existing ordinances of the corporation, requiring them to discontinue the use of steam below Forty-second street; * * [that] in consequence of such failure the company having determined to defy the acts of the common council, positively refuse to obey the ordinances of this body, and are now through their paid agents endeavoring to secure the passage of an act from the legislature of this state [a bill having been introduced for the purpose] to continue their present nuisance in violation of the existing ordinances, and their agreement with the corporation.

The resolution ended with a direction to the counsel of the corporation to prepare a remonstrance against the bill.

This resolution was regarded more or less generally as an open "strike," and suspicion deepened when in December of the same year the common council, with the approval of the mayor, gave to the same company the authorization to lay a double track on Madison avenue, from Forty-second to Seventy-ninth street, for their street cars.[1] Nothing whatever was demanded or required from the company for the privilege, and no conditions were imposed.

The remaining extensions were granted in later years. In 1864 the New York and Harlem Railroad Company was allowed to extend its horse car line from Thirty-second street and Lexington avenue, through Thirty-second street to the East Thirty-fourth street ferry.[2] Chapter 325 of the laws of 1872, empowered the company to extend from Seventy-ninth to Eighty-sixth street, through Eighty-sixth street to the Astoria ferry at Ninety-second street; on Madison avenue as far as that avenue should thereafter be opened; to charge not more than eight cents fare for any distance and not more than six cents below Forty-second street. Compensation was to be determined by a commission appointed by the supreme court. The five per cent on its gross receipts paid now by the Fourth avenue line applies merely to the extensions granted by the legislature. For the franchise below Seventy-ninth street no compensation at all was exacted and none has

[1] *Proceedings of the Board of Councilmen*, LXIX: 946.
[2] *Proceedings of the Board of Aldermen*, XCIII: 408–409.

ever been paid. The company was not even required to pave the streets through which its street car line passed.[1]

It cannot be said that when the New York and Harlem Railroad Company obtained its charter there was any public feeling. Many persons, indeed the majority of the inhabitants, regarded the charter as fairly well defining and maintaining the rights of the city. The absence of any clause requiring compensation called forth little or no comment. The railroad company put forth a plea that in such a new and untried enterprise capital was hard to get, that the whole project was purely a venture, that it would redound to the interest of the whole community by opening up the state, and that instead of driving a hard bargain city and state ought to hold forth every encouragement.

By the year 1850, the population of the city had grown to 515,394, an increase of nearly 350,000 since 1826. Immigration had increased at a rapid rate, due principally to famine and troubles in Europe, until, within a few years, over 300,000 persons landed annually at the Port of New York. The city had expanded with enormous rapidity. The rocky and swampy wastes were covered rapidly with buildings. The city had never known such prosperity. It soon became evident that the stages, which had long served as means of transportation, were inadequate. The success of the tramway or surface car having been established, the scramble for franchises became precipitous.

EIGHTH AVENUE FRANCHISE.

Sixth and Eighth avenues, tapping the settled and more populous districts of the west side, were viewed with eager eyes. On September 6, 1851, the Sixth Avenue Railroad Company was authorized to lay a double track from Chambers street up West Broadway to Canal, up Canal to Hudson street, up Hudson to Eighth avenue, and up Eighth avenue to Fifty-first street,

said railroad [to] be continued through Eighth avenue to the Harlem river whenever required by the common council, and as soon and as fast as the avenue is graded.

The conditions imposed were that the space between the rails and the tracks, and at least eight feet in width outside the rails should be kept in good repair; that the company run cars as often as the street commissioner and the common council should from time to time prescribe, the present schedule being set forth in detail,

[1] *Senate Report*, no. 100, 1842.

and as much oftener as public convenience should require; that a five-cent fare for the entire length of line be charged, that no motive power but horses be used, and

also that the common council shall have the power to cause the same or any part thereof to be taken up at any time they may see fit; and also that the said parties, or either of them, shall not assign their interests in the said road without first obtaining the consent of the common council thereto.

Further, the foundations on each side of the rails were to be paved with grooved blocks of stone as far as Fifty-first street; the company was to keep an account of the receipts of each road and report it to the comptroller monthly under oath, to connect their road with such other roads as the common council might order to be connected therewith, to file with the comptroller a statement made under oath of the cost of each mile completed,

to surrender, convey and transfer the said road to the corporation of the city of New York whenever required to do so, on payment by the corporation of the cost of said road as appears by said statement, with 10 per cent advance, * * and to such an extent as the common council shall determine, shall take up at their own expense said rails or such part thereof as shall be required, and on failure so to do in ten days after such requirement, the same may be done at their [the company's] expense by the street commissioner.[1]

Finally, the company was not to be dissolved by the death or insolvency of any of its members, nor by act or operation of law.

This was originally called "the Sixth and Eighth avenue grant," but the roads later were separated, and in June, 1852, the route of the Sixth Avenue road was changed to substantially what it is at present, the branch on West Broadway from Chambers to Canal streets being built by the two companies jointly. The same conditions applied to both companies. When the two companies were made distinct, extensions were granted. In November, 1852, the common council authorized the Eighth Avenue Railroad Company to extend their system through Canal street to Broadway, giving the company an outlet to Broadway, upon which the only means of transportation was the stage coach. The resolution also permitted the company to tap Broadway further down town, at Vesey street, but on no part of their road below Fifty-first street was the fare to be more than five cents. The same resolution allowed the Sixth Avenue Railroad Company to charge every passenger five cents below Forty-third street.[2]

The failure to exact compensation from the grantees drew

[1] *Documents of the Board of Aldermen*, 1860, no. 18, p. 270.

[2] *Proceedings of the Board of Aldermen*, XLVIII: 421–422.

forth criticism in at least one official quarter. The comptroller, Mr. A. C. Flagg, suggested early in 1852[1] that for the monopoly enjoyed, the railroads should keep the avenues or streets paved from curb to curb, and should clean the streets.

> This [he wrote] would be a moderate compensation to the public for furnishing to the company not only a graded line for the road, but a thoroughfare already filled with more passengers than they can accommodate. In all cases of extending avenues to the Harlem river, each company, as a condition of its extension ought to be required to pay the expenses of grading and paving the avenue in proportion to the number of feet occupied by the double track. And the public ought to have the benefit of all revenues beyond ten per cent in a reduction of fare or a direct annual revenue might be exacted which would go to lessen taxation.

The aldermen received this communication listlessly and paid no further attention to it.

Apart from Comptroller Flagg's message, there is no evidence that there was any noticeable criticism of the terms under which the Sixth and Eighth Avenue Railroad companies obtained their franchises. The whole subject was new, both to the people and the officials; there was almost no precedent or experience to draw upon. The provision by which the companies agreed to surrender to the city their roads on demand, was thought to be proof of the wisdom, perspicacity and honesty of the city officials. Several years later, when the circumstances under which the franchises were granted were made public, there was no little amazement that such a provision so regardful of future public interests should have been included in the conditions; indeed it has never been fully understood how it came to be there.

The mayor seems to have viewed the aldermanic resolution of November, 1852, with distrust. He returned it on December 13, without his approval or objection;[2] but under the provisions of the amended charter it became a law. The Eighth Avenue Railroad Company immediately proceeded to break faith with the city by laying double tracks on College place and Barclay street, and was brought to time only by threat of the council to have the streets restored to their former condition.[3]

FIRST ATTEMPT TO SECURE BROADWAY.

Of all the streets and avenues, Broadway was the most coveted. This great artery, the principal residential and business

[1] See *Report of Comptroller Flagg to Common Council*, February 16, 1852.
[2] *Proceedings of the Board of Aldermen*, XLVIII: 525. [3] *Ibid.*, 525–526.

street, offered the most glittering inducements to franchise seekers. In July, 1852, Jacob Sharp and others presented a petition to the common council asking for permission to construct a surface railroad on Broadway from South ferry to Fifty-ninth street. The principal property-owners on Broadway, thinking it would ruin their property, protested vigorously. The common council delayed action for several months; but when the agitation had to some extent died away, the board of aldermen and the board of assistant aldermen passed the ordinance, notwithstanding the fact that no less than six other applications, each of which held out terms more favorable to the public interests, had been made. Thomas E. Davies and others offered to carry passengers for three cents and pay the city a million dollars. In another application, Davies offered to give the city one cent for every five cent fare charged. D. H. Haight and others offered to pay $100,000 a year to the city for a ten years' franchise (fares to be five cents for each passenger) and $1,000 license for each car, the prevailing fee being $20. John La Farge and associates offered a three-cent fare. Watts Sherman and others solicited the grant at a five-cent fare, agreeing to give the city one cent for each passenger. William McMurray and Henry Hilton offered a five-cent fare and a bonus of $100,000 a year.[1]

When these facts became publicly known, there was a wave of indignation. Mayor Kingsland sent in a veto, distinctly stating that all the petitioners who offered compensation were men of abundant means and wealth, and in all respects able to fulfill their offers.[2] To prevent the carrying out of the threat to repass the ordinance, Thomas E. Davies and Courtlandt Palmer brought suit in the superior court against the mayor, aldermen and commonalty of the city. On December 25, they obtained from Judge William W. Campbell an injunction restraining the common council from passing the ordinance over the mayor's veto. The injunction was scarcely served when Alderman Oscar W. Sturtevant offered a preamble and resolutions stating that Judge Campbell,

> without color of law or justification assumed the prerogative of directing and controlling the municipal legislation of the city, * [and that] * such unwarrantable interference with the rightful functions of a legislative body if tolerated without just rebuke would lead to innumerable ills.

The ordinance was repassed by the aldermen by a vote of 13 to 4.

[1] *Proceedings of the Board of Aldermen*, XLVIII: 530–537. [2] *Ibid.*, 532.

This action was received with the greatest astonishment. The next move was to punish for contempt. The aldermen engaged an able array of counsel. Every point that legal acumen could suggest or ingenuity invent was advanced, but vainly. Alderman Sturtevant, as the author of the resolution, was sentenced to be confined in the city prison for fifteen days, and to pay a fine of about $350. The other aldermen were only fined, Alderman Wesley Smith alone apologizing to the court. The court of appeals affirmed the action of the superior court, and the attempt to contruct a Broadway surface railroad failed for the time being.

THIRD AVENUE FRANCHISE.

Other applications were more successful. A number of politicians and stage owners—Elijah F. Purdy, Myndert Van Schaick, James W. Flynn, James McElvaney, Horace M. Dewey and seven others—secured the Third avenue franchise. The contract required the company to run cars as often as public convenience required and under "such prudential directions as the common council and street commissioner may from time to time prescribe." Passengers were not to be charged more than five cents for any distance between the southern terminus and Sixty-first street, and six cents for the entire length of the road. The company was to pay the annual license fee for each car allowed by law. Clause V declared that the association should not be deemed dissolved by the death or act of any associate, but his successor or interest should stand in his place, and the rights of each associate should depend on his own fulfillment of the conditions imposed upon him by these restrictions, or the articles of association and by-laws of the association. In case of his failure to fulfill the same, his right should be forfeited to and devolve upon the remaining associates. The company should not be dissolved by the death or insolvency of any of its members, nor by act or operation of law, but in such and like cases should continue, and the persons lawfully entitled to the shares should become members of the company.[1]

At this time, there was much more general interest than a twelvemonth before. The entire contract was severely criticised in some quarters; it was looked upon as an abject surrender of the city's rights. No compensation was provided for, except the usual license fee for each car. The company's grant was in effect not

[1] *Documents of the Board of Aldermen*, 1860, no. 13, p. 216.

only exclusive and perpetual, but the company itself was made a perpetual corporation. It was also pointed out that while the contract abounded in conditions, they were of such a trivial nature as to be of no value.

SECOND AVENUE GIVEN AWAY.

While the Broadway franchise resolution was causing much public discussion, the common council passed the Second avenue railroad grant. On December 15, 1852, an agreement was entered into between the city and the Second Avenue Railroad Company, by which permission was given to Denton Pearsall, Joseph C. Skaden, Abraham B. Rapelyea, William L. Hall and others, to lay and operate a line down Second avenue from or near Forty-second street to Twenty-third street; then down town by way of Twenty-third street, First avenue, Allen street, Grand street, the Bowery, Chatham, South and Roosevelt streets to Peck slip, and thence up town to Harlem.[1] The conditions were that the water courses were to be left free and unobstructed; the company was to pave the streets in and about the rails in a permanent manner, and keep the same in repair to the entire satisfaction of the street commissioner; horses were to be the only motive power below Forty-second street; the company was to run cars for the convenience of the public at certain stated intervals, as the common council might prescribe; the fare was to be not more than five cents to Forty-second street, and

that the common council shall have power to regulate the fare for the entire length of said road, when it shall be completed to the Harlem river.

The mayor neither approved nor vetoed it, but by the terms of the charter, it became a law.

NINTH AVENUE SECURED.

At the same time, other franchises were being speeded through the council. The Ninth avenue railroad franchise was awarded to James Murphy, William Radford and Miner C. Story. They were permitted to run cars, "for the conveyance of passengers from Fifty-first street to the Battery, and back," every day at stipulated times. No steam car was allowed. A five-cent fare was agreed upon though Alderman Smith fought for a three-cent fare, and the grantees were to pay the annual license of $20 for each car. The road was to be continued from

[1] *Proceedings of the Board of Aldermen*, XLVIII: 329 and 363.

Fifty-first street along Ninth avenue to Bloomingdale road, thence to Tenth avenue and the Harlem river, whenever required by the common council, and as soon and as fast as said avenues are graded. The resolution authorizing this agreement was adopted by the common council in 1852.[1] On January 12, 1853, Mayor Westervelt sent in his veto on the ground that the terms for which such exclusive privileges were granted were anything but adequate.[2] Nevertheless the franchise was granted. Property owners secured injunctions and for years kept the company from operation.

BRIBERY IN COUNCIL.

By this time rumors were rife as to the corrupt means being used to secure railroad, ferry and other grants. James E. Coulter, a lobbyist, in an affidavit made public in the newspapers, specifically charged the aldermen with bribery. There was an organized "ring," he said, "to receive and distribute bribery money." The grand jury therefore began an investigation into these alleged malversations, and handed down a presentment February 26, 1853.[3] After showing how certain aldermen received bribes for disposal of the city's water rights, pier privileges and other property, it said:

> It was clearly shown that enormous sums of money had been expended for and towards the procurement of railroad grants in the city, and that towards the decision and procurement of the Eighth avenue railroad grant a sum so large that would startle the most credulous was expended, but in consequence of the voluntary absence of important witnesses, the grand jury was left without direct testimony of the particular recipients of the different amounts.

According to the testimony, one set bribed the aldermen only to see them pocket the money and then vote in favor of the opposing company which gave a larger bribe. John Pettigrew and his associates, anxious to get the franchise, paid bribes to certain aldermen. The common council passed a resolution giving the grant to the Pettigrew company; the latter was hilarious. Suddenly the common council revoked its action and awarded the franchise to a company headed by Solomon Kipp, which had raised its bribery bid from $20,000 to nearly $50,000. Theodore Martine, a member of the February grand jury, testified:

> I know Solomon Kipp * * one of the grantees of the Eighth avenue railroad. * * He has frequently admitted to me that he had to pay large sums

[1] *Proceedings of the Board of Aldermen*, XLVIII: 423–431.
[2] *Ibid.*, XLIX: 165–166.
[3] *Documents of the Board of Aldermen*, XXI, part II, no. 55.

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of money to members of the common council to procure the passage of those several grants, and has frequently admitted that he has expended for said purpose upwards of fifty thousand dollars.[1]

The Third avenue franchise was obtained by the same means. The affidavit of James W. Flynn, a stage owner and one of the grantees of the Third avenue railroad franchise, sworn before Recorder Tillou, states:

Before procuring the grant there was money raised by the company for procuring it, but in what way it was used I do not know of my own knowledge. I do not know the exact amount raised, I gave something over two thousand dollars towards the fund. * * I was given to understand by Mr. Dewey,[2] all my associates except Mr. Van Schaick and Mr. Reynolds paid the same as I did; those two gentlemen were not in the habit of attending our meetings. * * My impression, derived from what passed, was that the sum of ten thousand dollars was to be placed where one of the assistant aldermen could get it; there was more money raised after it passed the board of assistants; it was raised for the purpose of assisting it through the board of aldermen. My impression, derived from what passed, [is] that the sum was to be placed in the hands of Mr. Dewey, who was to place it where one of the aldermen could get it.

I think the first sum raised after it passed the board of assistants, was between $9,000 and $10,000, and afterwards a further sum of from $7,000 to $8,000; I did not ask how this money was disposed of, and he advised me not to ask any questions; I think this, most likely, was Mr. Dewey; I think Mr. Dewey told me he had promised Alderman Tweed $8,000 to get the grant through the board of aldermen; * * there was in the neighborhood of from $28,000 to $30,000 raised.[3]

The affidavit of Patrick McElroy, another grantee of the Third avenue railroad franchise, read to the same effect.[4] Thomas Murphy also stated in his affidavit that he had subscribed his share on the understanding that money was to be paid to members of the common council to get the grant through.[5] The affidavit of James McElvaney, a fourth grantee, corroborated the testimony of his associates.[6]

The Eighth avenue railroad franchise—as did all the railroad franchises—remained intact notwithstanding the bribery revelations, there being no statute covering the case. The road immediately became one of the best paying in the city. For the first year of operation, it paid six per cent dividends, which in four years were increased to eighteen per cent.

PUBLIC SENTIMENT AROUSED.

The grand jury's revelations gave the city a painful shock. Corrupt as were the circumstances under which the ferry leases

[1] Document no. 55, p. 1573. [2] Dewey acted as treasurer and "go-between."
[3] Document no. 55, pp. 1333–1335. [4] *Ibid.*, pp. 1338–1341.
[5] *Ibid.*, p. 1348. [6] *Ibid.*, pp. 1336–37.

had been granted, the popular anger was more concerned with the railroad grants, which had been given upon the most beggarly conditions and without limitation as to time. The injury was beyond reparation, and public resentment was at fever heat. The prospect of burdensome taxation aroused the property owners to a keen realization of the trend of affairs. Something over $2,000,000 in 1852, the taxes had bounded up to between five and six millions in a single year, and soon reached $8,000,000, though no one knew where that sum—huge for the day—went. Valuable franchises, which had been disposed of for comparatively nothing, might have been made to yield the city millions directly and indirectly. The City Reform party was formed and secured a substantial majority in the common council of 1854, and for some years the official records show a constant effort on the part of municipal government to make the surface railroad companies fulfill their contracts, but without avail.[1]

APPEAL TO THE LEGISLATURE.

Thus property owners came to favor the law which required their consent to be given prior to the construction of a surface railroad, as they were, so they claimed, the ones most vitally interested. Yielding to public sentiment, the legislature in 1854 passed an act prohibiting the common council from granting franchises without having first obtained the consent of a majority in interest of the owners of the property upon the streets on which the road was to be constructed. Franchises were only to be made to those who could give adequate guarantees to comply in all respects with the terms and conditions of the grants, and who would agree to carry passengers at the lowest rate of fare. No grants were to be made until notice had been published in one or more principal newspapers inviting proposals and specifying the time and place.

The law met with general approval and was expected to pre-

[1] See, for many instances, *Documents of the Board of Aldermen*, 1860, no. 18. One resolution passed in February, 1857, by both branches of the common council and approved by the mayor, resolved that the street commissioner be instructed to cause the New York and Harlem Railroad Company to put their track in thorough condition. If the company refuses to comply within one week after the passage of the resolution, then the Third Avenue Railroad Company should have permission to lay a new track on the Bowery from Fifth to Grand streets and enjoy all the privileges held by the New York and Harlem Railroad Company on the Bowery line; and all permissions and privileges theretofore granted to this company conflicting with the resolution are to be annulled and repealed.

vent in great measure a repetition of the abuses. It may be well to note that thus at the very beginning, the city formed the habit of appealing to Albany for relief whenever corruption appeared at home. This had been done in the South Ferry agitation in the thirties, and although at first the immediate effect may have been beneficial, in later years it led to disastrous consequences.

The opposition to a surface railroad on Broadway below Union square being so persistent and powerful that a franchise could not be obtained, an application was made for a railroad parallel to it. In 1857, a bill was introduced, but not passed, in the state assembly to authorize John A. Kennedy and others to lay a road on Seventh avenue from Fifty-ninth street to Broadway, thence down Broadway to University place, down University place, Greene and Canal streets to West Broadway, and thence through College place to Park place. Upon learning of the introduction of this bill, the common council virtuously resolved that the public did not wish the road built, and that its enactment was unwise.[1]

ANOTHER BROADWAY SCHEME UNSUCCESSFUL.

The year 1859 was remarkable for the new schemes of plunder. The members of the common council were, for the most part, the political and social dregs of the city. They were mainly unprincipled and illiterate schemers put into office by the manipulation of primary elections, bribed election inspectors and ballot box stuffing. Their only conception of municipal legislation was power for self-interest. The most important "job" was one giving permission for a railroad on a part of Broadway and other streets.

Public sentiment against this invasion was as strong as ever. Not only property owners but the mass of the citizens were determined to keep Broadway clear. They were proud of their great avenue. It was the one notable route of all civic and military processions. The projectors of the new road, therefore, in order not to attract attention, euphemistically called it the "Yonkers Road," extending from "Yonkers to New York." The line was to be built by the New York and Harlem Railroad Company and was to run over its tracks to Eighth avenue, thence over a double track to Fifty-ninth street, thence to Seventh avenue, to Greenwich avenue, to Sixth avenue, to Eighth street, to Greene street, to Waverly place, to Wooster street, to Canal street, to

[1] *Proceedings of the Board of Aldermen*, LXVI : 25-26.

West Broadway, to Barclay street and Broadway. The plans also provided for a double track up Greene street to University place, to Broadway, to Forty-fourth street.

This route would be undoubtedly of greater value than any yet established. The projectors despaired of securing lower Broadway for the present but sought to "parallel Broadway," and having once secured upper Broadway, they believed they could get at an opportune moment, by an extension or series of extensions, the whole of lower Broadway. To evade the law of 1854, which required the consent of the property owners, they pretended to commence the road in Westchester county, north of Spuyten Duyvil, for the law related only to railroads, "commencing and ending within the city limits." According to report, a mile or two of railroad was to be built there but never used, that being just sufficient, it was thought, to get around the statute.

The lobbyists and legislators at Albany were eager to have the franchise granted there, and for a time a race was on between the city hall and Albany. The aldermen won by hurrying it through both branches December 7, 1859. The conditions attached were regarded as trifling. Seventy-five cars were to be used at an annual tax of $50 each per year, and the fare to Kingsbridge was to be five cents. Mayor Tiemann instantly vetoed this resolution, and appended to his message two communications, one from D. Henry Haight, Edwin Hoyt, Amos B. Eno and other men of standing, offering either a million dollars for the franchise or an annual license fee to the amount of $70,000; the other from D. R. Martin and others who offered $50,000 a year for the franchise. There was no right reserved, said Mayor Tiemann, as in the case of the Sixth and Eighth avenue roads to resume the property at cost. And he urged that revenue from railroad grants ought to be provided to pay the great expenses of the city.[1] The resolution was not passed over the mayor's veto.

COUNCIL DEPRIVED OF POWER.

The council of 1860 was fully as corrupt as its predecessor, the two bodies being practically identical in membership. The notorious Tweed Ring was just beginning operations. The criminal and semi-criminal classes ran the primaries and carried elections. Most of the officials elected were scarcely less dishonest, although,

[1] *Proceedings of the Board of Councilmen*, LXXVI: 994–1000.

perhaps, more genteel. The wave of reform had spent its force apparently with no permanent results. People had despaired of electing an honest council. In the midst of these conditions, Governor Morgan sent his annual message to the legislature, stating that the increased population of New York made necessary more street railways and advising that franchise grants be made a source of revenue. He further recommended the enactment of a law taking from the city council all control over future grants and vesting it in the legislature.[1]

The legislators were not slow to take the hint; but the aldermen were not willing to surrender so rich a field of revenue. They accordingly raised the cry of "home rule," and on January 30 passed a resolution reciting that the bills before the legislature were

> in direct contravention of the guaranteed rights, privileges and immunities of the citizens of this city, said bills by their provisions having in contemplation the deprivation of the inhabitants of this city of all control, right, title and interest over the streets, avenues and public places and highways located in said city, * * without the sanction or consent of its corporate authorities, the agents and representatives of its citizens, thus virtually creating companies or corporations possessing powers and privileges superior to the representatives of the people, by conferring * * monopoly of our principal streets and highways.[2]

This protest made little impression upon the people of the city. The common council was doubly denounced in reply for having invited this invasion, but the public manifested little interest.[3] That the legislature was interfering most decidedly with the rights of the city was generally believed, but as in 1854, beneficial results were expected. If the common council had rented the ferries to the highest bidder, and sold the various franchises by the same method, the legislature would not have ventured to encroach.

So apathetic was local opinion that the first bill went through easily, the vote in the assembly—60 to 0 on the original bill[4]—indicating the overwhelming public sentiment in favor of stripping the common council of its powers. The act provided that it was not

[1] *Assembly Journal*, 1860, pp. 33–34.

[2] *Proceedings of the Board of Aldermen*, LXXVII: 173–174.

[3] It is of very little consequence to the people [one editor wrote] by which class of robbers they are despoiled. That they will be plundered by one or the other is certain; and it is only a choice of evils of which it is very hard to choose the least.—New York *Herald*, Feb. 2, 1860.

[4] See *Assembly Journal*, 83rd session, 1860. The senate rejected the assembly bill and passed an amendment more sweeping in its provisions, which the assembly adopted and Governor Morgan signed.

lawful to construct, operate or lay any railroad in the streets or avenues of the city of New York, except under authority and subject to the regulations and restrictions which the legislature might thereafter grant or provide not impairing any grants previous to January 1, 1860.

LEGISLATURE BESIEGED.

Thus the scene of activity was completely transferred to Albany. A beginning had been made in 1859, when half a dozen bills each providing for a franchise on miles of New York city streets had gone through the assembly with little resistance, but a handful of inflexible rural senators squelched them in the higher branch. For a number of years both the legislature and common council could grant franchises, but now the common council was wiped out. The lobbyists and railroad interests therefore deserted the city hall and pitched their tents in the capital, prepared to meet whatever demands might be made.

Within a month after the bill had passed, there was a multitude of railroad schemes before the legislature.[1] By the second week in March, two dozen projects, embracing nearly all the most valuable remaining thoroughfares, were being engineered through the two houses. Railroads were planned for Avenues A and B, Thirty-fourth street, Broadway, Eleventh avenue, Twenty-third street, South street, Grand street, Greenwich street, Tenth avenue, Seventh avenue, Forty-eighth street and many other streets.[2] The most important was the "Gridiron Bill," identical with the one Mayor Tiemann had vetoed, the speciously named "Yonkers Road" franchise.[3] The property

[1] All manner of subterfuges were resorted to in the effort to avert public attention and criticism. One instance was the introduction of a bill by Assemblyman Jacques, entitled "An Act for the better protection of strangers and citizens in the City of New York, and to incorporate the New York passenger and baggage line company." This sounded innocent enough, but the surprise of some members was great when the bill was later amended so as to read on, "by the construction of a surface railroad on Broadway, and other streets and avenues," (See *Assembly Journal* 83rd session, 1860). This bill was suppressed before it got far.

Another scheme of the franchise seekers was what was known as the "pious and charitable dodge"—a popular move in that day. The prospectus of one city railroad company proposed to pay a mill for every passenger toward the foundation of a charitable institution, to be known as "The City Railroad Hospital."

[2] *Assembly Journal*, 1860, pp. 1339-1341, 186-194, 769-829, 168-271, 373-387, etc.

[3] This bill now allowed the company, after reaching Broadway and Barclay street by the Broadway parallel route, to lay tracks down Broadway from the Astor House to South Ferry. Connection with the latter point, with its in-coming and outgoing crowd, had been most ardently desired ever since surface railroad franchises first had been granted.

owners, public bodies and the newspapers began to protest vigorously and to urge that the legislature pass a law providing that all franchises be sold to the highest bidder to defray the enormous expenses of the city government. The legislature heard the ominous mutterings and dropped the Yonkers Road project, but ignored the suggestion as to public auction of franchises.

WHOLESALE GRANTS.

Of the many bills that day after day poured into the legislature, five were favorably reported by the assembly committee on cities and villages. These authorized the Belt line on South, West and other streets; the Avenue D line; the Seventh Avenue line to Jacob Sharp, Peter B. Sweeny, John Kelly, John Kerr and others; the Fourteenth street line; and the Tenth avenue and Forty-second street line. In reporting these bills, the committee on cities and villages through Assemblyman Pond justified its action in granting these franchises with scarcely any conditions, except the most perfunctory, and asserted the supreme power of the legislature. The surface cars in New York city, the report stated, carried 25,000,000 passengers annually, yet the existing roads traversed but an inconsiderable portion of the city. The report continued:

> As to the proposition that New York city has certain inalienable rights, the committee argue that all the power conferred by any charter is held at the will of the people and that the legislature has the power to alter, annul and abridge any privileges enjoyed under the charter. The proposition that a municipal corporation established for public purposes has inalienable rights, interests and powers in or over the property held for it for public purposes, attacks not only the greater portion of the unquestioned legislation of the State for more than half a century, regarding cities, but involves the contradiction of a sovereignty within a sovereignty. The City of New York is not entrusted with the power to acquire property for the benefit of its citizens alone, but for the whole public of the State, all of whom have an equal interest in public parks, streets and places.

The committee finally declared that the proposed surface railroads were demanded by public interest, and the legislature proceeded to pass the five bills and also a bill confirming the grant of the Ninth avenue railroad franchise to George Law. Since 1853, the property owners along Washington and Greenwich streets had been contesting the right of the company to lay rails on those thoroughfares.[1] Notwithstanding the fact that a suit was before

[1] Soon after this, the road was sold for $712,446, which purchase was "to include a franchise covering a distance of a route of thirteen miles to the Harlem river," and certain real estate valued at about $330,000. (*Our City Railroads*, New York *Times*, Dec. 26, 1865.)

the supreme court, the company proceeded to lay the rails in the disputed districts, and in July, 1859, the road was opened through Canal, Washington and Greenwich streets. Before the supreme court had yet rendered a decision, the company brought influence to bear upon the legislature to have the franchise confirmed.

GOVERNOR'S VETO INEFFECTIVE.

Governor Morgan unhesitatingly vetoed the five bills granting separate franchises, but signed the bill confirming the Ninth Avenue Railroad franchise to George Law. The veto message was extraordinarily severe. After stating that the grants should impose suitable conditions and that payments should be made into the city treasury, Governor Morgan continued:

> That the privileges proposed to be conferred in these Acts are deemed of great precautionary value needs no other elucidation than the fact that responsible individuals stand ready to pay a large bonus into the treasury of the City of New York for the franchises conferred upon the persons named in these bills without cost or equivalent. * *
>
> Ordinary prudence would suggest that this [perpetual grants] be avoided. Powers that are useful to-day under the changing circumstances of communities and of municipal operations, may a few years hence become objectionable. Hence it is that exclusive benefits of patents are limited; the existence of corporations circumscribed within certain periods, ferry franchises defined and restricted. The whole genius of our government requires that privileges granted, especially those of pecuniary value or affecting the public convenience shall, after a certain time cease, and the power of revision and amendment be exercised in accordance with the requirements of public interests.[1]

The legislators listened to the reading of this message on April 17, the last day of the session, with unconcealed impatience. The lobbies were crowded with a profusion of railroad advocates, agents and prospective owners, watching every move anxiously. Nearly every senator who spoke bitterly attacked the Governor personally. Only a mere handful of members defended him. Then, without debate, the bills were passed over the veto.[2]

LEGISLATIVE BRIBERY.

It was generally believed that the passage of these five bills cost the projectors $250,000 in money and stock, distributed among

[1] *Assembly Journal*, 1860, pp. 1839–1841.

[2] *Assembly Journal*, 1860, pp. 1863–1866. The Seventh Avenue Railroad, which was created by one of these bills, and the franchise for which was given to private parties, was sold by them to another company in June, 1864, for $3,183,739.91, the larger part of which was for the franchise. (*Our City Railroads*, N. Y. *Times*, Dec. 26, 1865.) This dealing seemed strongly to bear out the charge that the franchises were granted to speculators or dummies for legislators, whose only aim was to dispose of the franchises later to the highest bidder.

the purchasable members of the two houses of the legislature. Some persons who professed to know put the cost at half a million dollars.[1] There is now no tangible proof to draw upon, but of one thing there is no doubt; viz., that the legislature of 1860 was the most corrupt that had ever sat at Albany.[2]

The franchises granted were estimated at that time to be worth at least from fifteen to twenty millions of dollars. The severest terms were used in all expressions of public opinion for thus delivering the city to speculators who, according to the provisions of the bills, could gridiron fifty or sixty of the finest avenues and streets when and how they pleased, and without any conditions imposed as to time, mode of construction, compensation to the city or rate of fare. But the bills had been passed; neither railroad projector nor legislator cared for the criticism.

The common council refused to recognize the legality of the franchises,[3] and when in 1862 one of the companies began laying a railroad on Seventh avenue and other streets, the board of councilmen passed resolutions instructing the corporation counsel to apply for a stay of proceedings. During the spirited debate which followed in October as to the question of legality,[4] a temporary injunction was obtained by property holders, restraining the Seventh Avenue Railroad Company, but the court refused to make it permanent. All the franchises were uniformly upheld.

The legislature of 1861, aware of the resentment the action of its predecessor had aroused, did not grant more franchises, especially as petitions were being circulated through the state asking for an investigation of the means whereby the New York city franchises were passed. Mayor Wood even argued for a separation of city from state.[5]

BROADWAY STEAL AGAIN ATTEMPTED.

The most profitable of all franchises still remained unappropriated, and struggle for its ownership soon began anew. In

[1] New York *Herald*, April 19, 1860.

[2] Even the New York *Tribune*, which had rendered such efficient service in the election of the legislators in question, stated at the close of the session that it did not believe it possible "that another body so reckless, not merely of right but of decency—not merely corrupt, but shameless—will be assembled in our halls of legislation within the next ten years."

[3] *Documents of the Board of Aldermen*, no. 13, 1860.

[4] *Debates of the Board of Aldermen*, 1862, pp. 728–9.

[5] *Documents of the Board of Aldermen*, part I, 1861.

1863 a bill was introduced in the legislature granting to George Law and others a franchise for a surface railroad on Broadway. As there were certain indications that it would pass, the mayor and common council resolved to forestall it. In a special message on April 2, Mayor Opdyke urged opposition to the bill and pointed out that

parties of undoubted respectability had offered $2,000,000 for it, while it is estimated to be worth double that amount. These parties have offered to carry passengers for three-fifths of the rate of fare named in the Legislature's bill or instead of this reduction to pay $200,000 into the city or state treasury for ten years.[1]

COUNCIL GRANTS FRANCHISE.

The common council supported the mayor and met the same evening fully prepared to rush through, with scarcely any discussion, one of the most important measures that ever enlisted public interest. The promoters of the legislative bill procured injunctions. But when a deputy-sheriff attempted to serve them, he was hustled out of the room, and the doors guarded so that no papers could be served. The common council then granted the franchise for a surface railroad on Broadway from Union square to South ferry to the New York and Harlem Railroad Company, which had offered ten per cent of the gross receipts—generally considered good terms. The resolution also required the company to pay a license fee of $25 for every car and to provide ample security for the comfort and convenience of passengers. The common council claimed power to make this grant under the charter made to the New York and Harlem Railroad Company in 1832, which empowered the mayor, aldermen and commonalty to extend the company's tracks through and along Fourth avenue and other thoroughfares, and "through such other streets as the Mayor, Aldermen and Commonalty may from time to time permit."

The next day Mayor Opdyke approved the bill, stating that notwithstanding the well-known objections to a railroad on Broadway, a bill for the same purpose was before the legislature which utterly disregarded the interests of the city and was likely to pass. It made no provision for revenue to the city; it provided for no compensation to the property holders, no repairing of streets, and did not subject the grantees to laws governing corporations. Between the two grants there could be no hesitation in making a

[1] *Proceedings of the Board of Aldermen*, XC: 23–25.

choice. No grant for any other railroad had approached this one in protecting the interests of the city.[1] It was expected to yield $200,000 a year.

When the news of the passage of the ordinance reached Albany, the legislators were enraged. The assembly on the day on which Mayor Opdyke signed the resolution, passed the Broadway bill, and a section was added repealing that portion of the New York and Harlem Railroad Company's charter which allowed that Company to extend its road through other city streets.

Among the citizens of New York, there was considerable indignation that a charter of such elasticity should have been granted, and it opened their eyes to the danger of giving charters without minute and careful examination. Yet public sentiment quite unanimously approved the action of the common council. Under other circumstances, the citizens would probably have been as unanimously opposed to a railroad on Broadway and especially one owned by Law and his associates, owing to the very unsatisfactory way in which the Eighth avenue road, owned by the same parties, was managed and the contempt with which public and private interests were regarded.

LEGISLATURE ACTS.

The final vote in the legislature on the Broadway bill was taken amid charges of rampant corruption. Later, these charges were shown to be true by the testimony taken in an Albany court, when William Brown, assemblyman from Monroe county, and Gideon Searles, assemblyman from Cataraugus county, were arrested upon the complaint of Theodore McManee on April 23 on the charge of receiving a valuable consideration for their votes on the Broadway railroad bill. James R. Thompson testified before Justice Cole that Brown was to get $400 for his vote—$200 down and $200 after the bill's passage. Other members, whom it was supposed Brown could influence, were to be paid $300 each on voting for the bill. Brown, however, returned his portion, thinking he "would get into a scrape."[2]

No sooner had the legislature passed the bill (even before Governor Seymour had acted on it) than the company headed by George Law commenced laying track at Fourteenth street and Broadway, at the Battery and elsewhere, the object being to get first pos-

[1] *Proceedings of the Board of Aldermen*, XC: 92–93.
[2] Albany dispatch, New York *Times*, April 24, 1863.

session. At the same time, the New York and Harlem Railroad Company began laying tracks at three different points along Broadway, but work was stopped suddenly by serving on the mayor, the clerk of the common council and the officers of that company an injunction issued by Judge Barbour in the supreme court at the instance of those acting in Law's interests.

GOVERNOR VETOES GRANT.

A fortnight later, Governor Seymour vetoed the Broadway railroad bill, holding it to be unconstitutional, as it permitted the use of such streets and avenues, without the consent of the mayor, aldermen and commonalty of New York city, and without providing any compensation for such use. The practice of legislative interference with the rights of local self-government and with franchises was full of mischief. It had not only wronged nearly one-quarter of the population of the state, but had brought marked evils into legislation. By transferring appointments and jurisdiction from the locality to the capital, measures of the greatest concern and importance were determined by those having no knowledge of or direct concern in the vast interests they were affecting. This not only led to numberless schemes for personal advancement at the expense of a municipal population, but also caused a constant feeling of insecurity. It tended to corruption and to form an active body who surrounded the capital and improperly influenced and shaped legislation. Much of the odium which frequently attached to representatives was due to the fact that they were made unconscious instruments of those skilled in the art of procuring or preventing the passage of laws. Governor Seymour concluded his message with the statement that the rights of the city demanded that this recent policy of interference with local rights and legislation should be abandoned.[1]

The veto was received with marked signs of general approval in New York city. The citizens desired no railroad at all on Broadway and now breathed more freely. It was too late for the legislature to pass the bill over the governor's veto, even if it had chosen. As for the road projected by the New York and Harlem Railroad Company, it was never completed. The courts had held the Act of 1860 supreme.[2]

[1] *Assembly Journal*, 1868.

[2] In 1864 also, when the common council authorized the Third Avenue Railroad Company to extend its road on Sixty-sixth and Seventieth streets to the East river and on other thoroughfares, the supreme court held it invalid under the Act of 1860.

COMPENSATION TO THE CITY.

However, the offer of the Harlem road to pay ten per cent of the gross receipts for a Broadway franchise called attention to the disparity between the profits enjoyed by the surface railroad companies and their payments to the city. In 1864, the following were the statistics:

Railroads.	Gross Earnings.	Number of Passengers Carried.
Fourth Avenue	$735,101.39	5,795,238
Third Avenue	836,514.15	5,770,078
Sixth Avenue	233,551.00	8,050,674
Seventh Avenue	95,550.78	1,890,941
Eighth Avenue	452,700.62	9,054,012
Ninth Avenue	90,108.01	1,802,160

The companies were paying to the city only a minute sum considering the privileges they enjoyed. There was a growing sentiment that as they nearly monopolized the streets through which they passed, and did as little as possible to accommodate the public, they ought to be made to contribute annually a reasonable sum. Mayor Gunther suggested that a bill be presented to the legislature requiring all the city railroads to keep in repair the pavements of the streets they traversed and to pay ten per cent of their receipts into the city treasury.[1] The companies easily smothered the scheme.

Yet the companies were most grasping in every way. For instance, when congress imposed an internal revenue tax of one-eighth of a cent for each passenger carried, the companies charged six cents for every passenger, and kept it up until 1870. Several citizens brought suits against the companies and recovered judgment.[2] Then the companies, perhaps aware of their untenable position, influenced congress in March, 1865, to add a section to the revenue laws, allowing them to "add to such fare one cent in lieu of such fraction." A number of passengers refused to pay the six cent fare and were ejected, but it was explained that the cases decided referred to conditions before the year 1864, and that in view of the action of congress in 1865, the companies now had legal right to charge six cents.

[1] *Proceedings of the Board of Aldermen*, XCIII: 501–503.

[2] In the case of George W. Black against the Sixth Avenue Railroad Company, Judge Daly, in the court of common pleas, decided in March, 1866, that a six cent fare was illegal; that the charter of the company distinctly provided for a five cent fare; that the company had no right to collect the other seven-eighths of a cent.

ATTEMPT TO SEIZE BROADWAY.

While the Broadway fight was going on, other franchises were granted by the legislature; the Dry Dock and East Broadway, and the Forty-second and Grand Street companies were formed in 1863. The former company agreed to pay the city five per cent of the net proceeds, and $50 for each two-horse and $25 for each one-horse car. The latter company was required to pay merely $50 per car per year.

The great traffic across North and East rivers made important ferries desirable termini for street railroads, and these the Dry Dock and East Broadway company planned to get. On the morning of October 28, 1866, pedestrians were surprised to see a gang of men at work tearing up Broadway and laying tracks from Ann to Fulton streets, the purpose of the company being to extend the track from Fulton to Washington streets, thence to Cortlandt street ferry. This short extension, it was estimated, would double the value of the original franchise. But Corporation Counsel O'Gorman submitted an opinion that the tracks were laid "without any authority of law,"[1] and called upon the police authorities to remove the rails. The company reluctantly removed them.

BLEECKER STREET ROAD.

The Bleecker Street and Fulton Ferry franchise was granted by the legislature in November, 1865, on condition that the company pay one per cent of its gross receipts and a license fee of $50 per car annually. Among the incorporators of this road were Hugh Smith, later a fugitive from justice, and Peter B. Sweeny, the "brains" of the Tweed Ring. Receiver Southworth stated in a report filed in the county clerk's office January 27, 1876, that $434,000 of its bonds were given away gratuitously. The curiosity as to who got them has never been satisfied.

For the first ten years, the Bleecker Street and Fulton Ferry Railroad Company was subjected to that process known as railroad wrecking. Receiver Southworth reported that since 1866 the president of the company, John T. Conover, had used the road to enrich relatives, who by corrupt means largely appropriated its earnings. Conover, as shown by the books, never paid a dollar for his stocks and bonds. In 1873 the company had been allowed

[1] *Proceedings of the Board of Aldermen*, October, 1866, to January, 1867, CIV: 86-89.

to lay rails to the Christopher street ferry—a new franchise, Receiver Southworth stated, more valuable than the old. There ensued a contest between the Bleecker Street and rival crosstown railroads, in which, the receiver charged, Conover made a corrupt bargain not to have the rails laid by his company. Receiver Southworth went on to state that for $50,000, he could begin the operation of three miles of railway under these franchises which would add more than $110,000 annually to the income of the company—a sum more than sufficient to pay the bonded debt of the road and a fair dividend on the stock in the course of two years.

Were the present road properly managed [Mr. Southworth wrote,] $450,000 a year could be collected, or nearly $200,000 in excess of the present earnings. With the use of the new franchises the earnings could be increased to $730,000 per annum, making one of the most valuable franchises in the city.

GRIDIRON BILL OF 1869.

All previous attempts to secure Broadway were insignificant beside that of April, 1869. Senator Genet introduced the bill—a bill in which there appeared to be no deceptive provisions. Later the senators not in the secret were astounded to find on their desks one morning an entirely new bill. Care was taken that no copies should be distributed, the object being to prevent public comment until proper arrangements had been made to "run it through." It named as grantees John Kerr, John Cosgrove, John S. Martin and several dozen others, a large number of whom were obscure or unknown, whose names did not appear in the city directory, on the internal revenue or city and county tax books. The bill authorized them or their assigns to lay, construct and operate a railroad on Broadway to Twenty-third street, to Lexington avenue, to Thirty-fourth street, to North river and on parts of Fifty-ninth, Seventy-second, Fourteenth, Duane, Chambers, Fulton streets, Burling slip, John street, Maiden lane, Pearl and Wall streets, to the Wall street ferry, Dey and West streets, to the Cortlandt street ferry. The bill even gave over Fifth avenue by a subtle provision, and allowed the company to charge the same fare as other companies, and which "should not be increased beyond one cent for each passenger without the consent of the legislature." For these comprehensive privileges, unprecedented in the granting of franchises, no compensation to the city was provided. The grantees were virtually to obtain the franchise for nothing.

It took some time for the senators not in the "ring" to recover from their astonishment. As soon as they did so, Senator Palmer ironically moved that the bill be amended to allow the incorporators to take possession of all the streets in New York. Senator O'Donnell unsuccessfully offered an amendment requiring the consent of the property owners.[1] Senator Morgan offered an amendment that the franchise thus granted be sold at public auction by the city comptroller on June 1, the proceeds to go to the city treasury.[2] Defeated in this, Senator Morgan next offered an amendment requiring the persons securing the franchise to pay $2,000,000 to the city chamberlain as a consideration for the franchise. This amendment, likewise, was defeated.[3]

When the telegraph bore the full purport of this bill to New York city, Alexander T. Stewart, the millionaire dry-goods merchant, immediately made a public offer to W. W. Campbell, chairman of the railroad committee of the senate, to pay two million dollars for the franchise, and more if necessary. The senators favoring the bill paid no attention to this offer. Report had it that Genet and his associates intended to bribe a sufficient number of assemblymen with money.

GOV. HOFFMAN'S VETO.

In the meantime, Governor Hoffman sent in a veto of a bill granting the franchise for a street railroad on One Hundred and Twenty-fifth street to ninety-six persons who also were for the most part dummies. In his veto, Governor Hoffman laid down the doctrine that franchises belonged to the city. They should not be given away to private speculators, but sold at public auction, and the proceeds put in the public treasury. The message continued:

> Ten or more railroads have already been established in the city of New York, by virtue of special grants made by the legislature. None of these roads has been required to make any payment for the value of the privileges granted, except a mere nominal license fee or * * a nominal annual payment. All these grants were valuable when made, and some of them were and are of great and increasing pecuniary value. The capital stock of the roads has been greatly disproportioned to their actual outlay and expenditures. Two of them, and only two, viz., the Sixth avenue and the Eighth avenue roads are required to make monthly returns of their receipts. The receipts of these two companies during the last year were as follows: Sixth Avenue—$618,570.51, Eighth Avenue—$783,288.79. From the statement of receipts (which in each case are about double what they were ten years ago) some idea may be formed of the great and increasing value of railroad grants in the city.

[1] *Senate Journal*, 1869, p. 550. [2] *Ibid.* [3] *Ibid.*, p. 552.

Finally Governor Hoffman recommended that grants be disposed of to the highest bidder at public auction.[1]

The exalted tone Governor Hoffman assumed in this message and the lofty sentiments expressed must be taken *cum grano salis.* The governor was a creature of Tweed and owed his political success to the "Boss." Hoffman, when mayor, had vetoed a measure for a railroad on One Hundred and Twenty-fifth street and had to be consistent. Tweed, now state senator, voted to sustain Hoffman's veto.[2] Not that Tweed was so virtuous, but he wanted the franchise himself and later got it. The veto of the Broadway bill made its promoters despair, and they had it laid on the table as the most graceful way of disposing of it.

The repeated protests of the executives of the state and New York city against the granting of exclusive franchises without putting them up to the highest bidder now seemed to have borne fruit. There was general satisfaction when by an act of the legislature passed May 10, 1869, authorizing the construction and operation of a surface railroad on Twenty-third street, from river to river, it was provided that the franchise should be sold at public auction. It was awarded to Sidney Yeomans on his bid of $150,000. This is the first instance of the sale of railroad franchises at public auction.

CORPORATIONS BLACKMAILED.

No small proportion of the Tweed ring's stealings was derived both directly and indirectly from the public franchises operated by private companies. The politicians invariably were the recipients of a gratuity in the form of stock in gas, street railway and other companies. This was given in order to assure their good will, for a hostile politician could at any time embarrass a corporation or private individual through the enforcement of municipal ordinances. In return for protection, the politicians exacted conditions apart from stock or money. To make their machine more effective and to extend their personal following, they demanded that the different companies employ men either recommended by them or their trusted district leaders. The companies knew that to refuse these requests involved disaster, for the common council could force them to make improvements or alterations at ruinous expense; it could even annul their charter.

[1] *Senate Journal*, 1869, pp. 591-598. [2] *Ibid.*, p. 1168.

Tweed and his associates deprived the common council of this power and vested it in themselves. When the official city force was filled with their henchmen, and when the scores of useless and superfluous positions created would not suffice, they ordered the street railway companies to employ their heelers, until they created a larger army of personal followers and blind devotees than had ever been gotten together. For these services the companies received distinct and valuable immunities. For instance, when Andrew H. Green was appointed deputy-comptroller, the New York Council of Political Reform made an investigation. In a tabulated report made public February 1, 1872, this body charged that in the single item of city railroads, the city for a long period had been swindled annually out of at least one million dollars.[1]

EMPLOYEES OVERWORKED.

At the same time the companies were demanding unusually long days of their laborers and in other ways exacting every cent possible. The employees of one company struck when ordered to make eight round trips a day, wash their cars, attend to their horses and do other work—services which extended the daily work to seventeen hours. A few years later, in 1876, the half fare system was abolished; that is to say, the old rate of three cents for children under twelve years of age was effaced and full fare demanded. This was not a violation of charters, but considering the enormously valuable franchises given to the companies, it was extremely overbearing. Shortly afterwards the Fourth and Sixth Avenue railroad companies reduced the pay of their employees—the drivers and conductors—from $2.25 to $2.00 for a working day that averaged fifteen hours. In 1886 the employees of several companies struck. They complained of having to work sixteen and seventeen hours a day, getting only $11.50 to $12.25 a week. They wanted a 12-hour work day at $2 a day.

OTHER FRANCHISES GRANTED.

The evils of the laws relating to the granting of railroad franchises had become so glaring, that the members of the Constitutional Convention of 1874 resolved to take away from the legislature the almost unlimited power it possessed in this respect. The constitution as amended by this convention required the consent

[1] New York *Times*, February 1, 1872. As this is written, charges that similar methods are used by Tammany Hall are being made.

of the local authorities and half the property owners, or failing the latter, the consent of the general term of the supreme court to the building of any road. This amendment was adopted by vote of the people and took effect on January 1, 1875.

The legislature of 1873 granted franchises to the Central Crosstown Railroad Company to operate on Fourteenth, Seventeenth, Eighteenth and other streets, the consideration being the payment to the city of three per cent of the gross receipts; to the Christopher and Tenth Street Railroad Company on the same terms; and to the Forty-second, Manhattanville and St. Nicholas Avenue Railroad Company, beginning at Manhattan street, North river, and continuing through St. Nicholas avenue to One Hundred and Tenth street, thence to the East river, with branches from One Hundred and Tenth street and First avenue to One Hundred and Ninth street, to Avenue A, and from Manhattan street along Tenth avenue to the ferry at Forty-second street, North river, and from there along Twelfth avenue to Thirty-fourth street. A spur was to run from Tenth avenue along Eighty-sixth street to the North river.

In September, 1878, the board of aldermen authorized this company to extend its tracks in Forty-second street, from Tenth avenue to the East river, the city to receive three per cent of the gross receipt and the company to keep the pavements between the tracks in good order. This measure was vetoed by Mayor Ely, on the ground that it did not appear that a majority of the property owners had consented, and that if the common council could empowerthe company to extend its tracks in Forty-second street, it could also by a two-thirds vote authorize any railroad company to extend its track, on Broadway and Fifth avenue.[1]

When the board of aldermen met on October 14, the Forty-second Street Crosstown Railroad Company, a rival company, offered the city $50,000 as a bonus and three per cent of its gross receipts annually for the privilege of laying a double track on Forty-second street.[2] Alderman Phillips declared the privilege was worth a million dollars, and that it should be sold at auction to the highest bidder. Alderman John J. Morris submitted a remonstrance from the owners of $1,700,000 of property, and a resolution that the franchise be sold at public auction if the property owners favored it. These resolutions were summarily disposed of by being ordered on file.

[1] *Proceedings of the Board of Aldermen*, CLII: 83–84. [2] *Ibid.*, p. 163.

MANHATTANVILLE FRANCHISE.

On December 3, the railroad committee of the board of aldermen submitted to that body a report favoring the granting of the franchise to the Forty-second Street, St. Nicholas Avenue and Manhattanville Railroad Company. Ten years before, the report stated, all that part of the city west of Fourth avenue, east of Central Park and north of Forty-second street was a barren waste. The country is just emerging from a monetary crisis and business depression, and enterprises such as this railroad that promise such abundant success, should be encouraged. Three per cent of the gross receipts is certainly a very liberal offer, and should be at once accepted. It would be in the interest of the city to construct the railway at the expense of the public, if in no other way could it be built. It would have been a decidedly paying investment, if the city built such a means of communication twenty or more years ago. The west side would now be as thickly populated as the east side and center of the city, and the increased taxable value of the property would have yielded to the city the cost of the road and left a large margin besides. All franchises should be sold at public auction to the highest responsible bidder; but as this company appears to have a franchise from the state legislature, the common council are powerless in this instance to dispose of the franchise in this way.

Alderman Morris and others denounced this report and pointed out that the members of the committee did not believe all they said; and while protesting that franchises should be sold at public auction, they recommended the practical giving away of a valuable franchise in the face of an offer much more advantageous to the city. The device was an old one and well known. Nevertheless, the aldermen adopted the committee's report by a vote of 15 to 7, and on December 27, 1878, gave the grant to the Forty-second Street, St. Nicholas Avenue and Manhattanville Railroad Company, passing the resolution over the mayor's veto.[1]

On December 17 of the same year the Board gave permission to the Harlem Bridge, Morrisania and Fordham Railway Company to extend its tracks across the Third avenue bridge to connect with the elevated railroad station at One Hundred and Twenty-ninth street. The franchise was given gratuitously. Mayor Ely vetoed the resolution, but it was passed over his veto.[2] The company

[1] *Proceedings of the Board of Aldermen*, CLII: 771–773. [2] *Ibid.*, 702.

never paid anything to the city for the privilege until September 19, 1898, when, at the instance of Bridge Commissioner Shea, the Union Railway Company (which absorbed the old company) agreed to pay the city $2,000 a year as compensation for a permit to cross the new bridge.[1]

BROADWAY GRAB AGAIN.

All attempts since 1852 to lay a railroad on Broadway below Union square had been futile. Public opinion had severely condemned every scheme and with success. But the prospective profits were so stupendous, amounting to millions of dollars, that the promoters were ever ready to grasp the first opportunity. In 1879 the majority of aldermen seemed in a mood to give the franchise to anyone who could "bring the proper arguments to bear upon them," and another proposition came before the board on March 11, 1879. As usual, it was instantly and vigorously opposed. Alderman Roberts offered a series of resolutions stating that no franchise for a railroad on Broadway will be approved of by this board that does not embody these propositions: (1) A continuous line from the Battery to Central park, fares not to exceed five cents, for the entire length of the road; (2) the sale of the franchise at public auction to the highest bidder, and on such terms and with such restrictions as shall be deemed for the best interests of the city. He argued that as public property must be sold by auction to the highest bidder, "a franchise comes under that rule." These resolutions were lost by a vote of 15 to 5.[2]

COUNTER OFFERS.

Alderman Sauer then offered resolutions giving the franchise to the Broadway and Seventh Avenue Railroad Company. The fare was not to exceed five cents over the whole route, and the company was to pay semi-annually to the city treasury five per cent of its gross receipts from fares "collected on the extension." The company was to be required to remove all snow from the carriage way on Broadway from Fourteenth street to Bowling Green, and keep the pavement in good repair between the tracks and for two feet on each side. These resolutions also gave the Twenty-third Street Railroad Company, which was owned in effect by the same men who owned the Broadway and Seventh Avenue line, the power

[1] *Annual Report of the Commissioner of Bridges*, 1898, p. 21.

[2] *Proceedings of the Board of Aldermen*, 1879, CLIII: 857–859.

to connect the tracks leased by it from the Bleecker Street and Fulton Ferry Railroad Company, at the junction of Bleecker street and Broadway, with the new tracks on Broadway. And "for the further accommodation of the public," they authorized the New York and Harlem Railroad Company to extend its horse-car tracks on Fourteenth street so as to connect with the Broadway tracks. This device, therefore, was first to give a franchise which had been sought for over thirty years and regarded as the most valuable in the city under the form of an "extension," and, second, to allow different companies controlled by the same men to gridiron some of the most profitable streets in the city.

Other resolutions were also presented giving the franchise to the Forty-second Street, St. Nicholas Avenue and Manhattanville Railroad Company. The only conditions were that no more than five cents be charged for each passenger, that three per cent of its gross receipts be paid to the city annually, and that the company keep the streets in good order.[1]

Mr. J. B. Hawkins, on behalf of the City Democracy, argued for city management, but stated that if the council was determined to sell the grant without putting the same up for sale, he would pay in gold therefor one million dollars within ten days from the making of the grant. If neither of these propositions was acceptable, then he and others would form a corporation, charge only five cents for the length of the route, keep the whole of Broadway clean and in repair, and pay to the city treasurer weekly all over ten per cent of the net profits of the road, or would pay twenty-five per cent of such net profits whatever they might amount to, over and above the running expenses of the road, upon a basis of seven per cent interest on the cost of building and equipping it.[2] The aldermen preferred "being seen," and the communication was buried in the committee on railroads.

For a time, the aldermen made no further attempt to grant the franchise, and the franchise seekers then went to the legislature.[3] The legislature would take no action, and resort was had to the board of aldermen without success.

In 1880 there was a new attempt to give John Sloane, Pierre

[1] *Proceedings of the Board of Aldermen*, 1879, CLIII: 865–868. [2] *Ibid.*, 889–892.

[3] It was during the debate on a proposed petition to the legislature urging that no franchise be granted except to the highest bidder at a public auction that an alderman made the remark: "Does anybody suppose that this body of statesmen would give anything away without being paid for it?"

Lorillard, Lawrence Kip and others the franchise for a surface railroad on Broadway from South Ferry to Seventeenth street. The company was to pay the city five per cent of the gross receipts and keep the pavement between the tracks in good order. This resolution was also interred in the committee on railroads.

Since the constitutional amendment of 1874, no general street railway act had passed the legislature, except the Rapid Transit Act of 1875,[1] which excluded Broadway from the streets on which railroads could be laid. For the next nine years, there were frequent but futile attempts to pass a general law regulating the matter of laying out and constructing railroads. In 1883 such a bill, excluding Broadway from its provisions, was passed by the legislature, but did not receive the governor's approval. The following year a law was enacted empowering the local authorities —the board of aldermen—to grant railroad franchises *on any street whatever.*

SHARP BRIBES ALDERMEN.

This was the auspicious moment for which promoters had waited over three decades. The board of aldermen was induced to exercise its power and vote away the franchise. When this became known, there ensued such a struggle and such excitement as had not been known in many a day. The vote was not taken until August 6, but the necessary aldermen had been bought as early as May, as disclosed later by testimony. There were two principal competitors—the Broadway Surface Railroad Company, and the Broadway Railroad Company which sought to run a cable road. What followed was tersely described by Alderman Fulgraff in his testimony in the trial of Alderman Arthur J. McQuade, before Recorder Smythe, on November 19, 1886:

A special meeting of the board was held in my factory in Fulton street in the month of May, 1884. There were thirteen members present. They were DeLacy, Dempsey, McLoughlin, Sayles, McQuade, McCabe, Kenney, Jaehne, Cleary, Reilly, O'Neill, Duffy and myself. It was proposed that the thirteen should vote together on everything that came up except on political issues.

It was determined to have a meeting at McLoughlin's house a week later. At this meeting the same thirteen were present. The first subject taken up was the Broadway franchise. It was stated that a cable railroad company had applied for the privilege. It was said that the company had offered $750,000, half cash and half bonds, and that the Broadway Company had offered $500,000 in cash. I think Jaehne said the acceptance of $750,000 from the cable road would be risky as the bonds could be traced. He thought the Broadway Surface people would be safer.

[1] See page 168, *infra.*

On August 6, the franchise resolution giving the grant to Jacob Sharp and others came up before the board. Alderman Hugh J. Grant offered an amendment, providing for the sale of the franchise to the highest bidder.

> This franchise [he said,] is the most valuable that has been at the disposal of the city for years. I am credibly informed that a number of years ago the city was offered one million dollars for the right to build a railroad on Broadway. If the franchise was worth that amount then, it is certainly worth it now. I believe it is worth a good deal more.

The aldermen, however, were in no mood to listen to remonstrances, and with total indifference towards public opinion and public interests, they adopted the railroad committee's report giving the franchise to Jacob Sharp and his associates, without compensation to the city. Of the twenty-two aldermen present, Grant alone voted in favor of selling the franchise at public auction.[1] Thereupon, President Kirk of the board announced: "The franchise for a surface railroad is hereby given [sic] to the Broadway Surface Railroad Company." The vote having been taken—"the goods delivered"—, each alderman in the "deal," according to Fullgraff's additional testimony before Recorder Smythe, received $22,000.

Having been outwitted in its efforts to buy the aldermen, the Broadway Railroad Company gave public notice in a letter to Mayor Edson that it was willing to pay the city several hundred thousand dollars for the franchise and to make Broadway a trunk line, the tracks to be used equally by other companies. Subsequently, the same company in a letter to Mayor Edson offered a million dollars for the franchise, and the New York Cable Company offered a like sum.[2]

PUBLIC OPPOSITION TO ORDINANCE.

On August 18, Mayor Edson in an elaborate message vetoed the franchise resolution, saying among other things:

> I am convinced that this franchise can be sold for at least one million dollars, upon such terms and conditions as will protect the great thoroughfare from desecration, insure a proper construction and the use of rails which will produce the least possible obstruction in the streets, and at the same time guarantee efficient service. In such circumstances, to grant the consent asked for by "the Broadway Surface Railroad Company," without compensation would, in my judgment, be equivalent to giving a private corporation for its unrestricted use, property of the city of the value of a million dollars.[3]

As the aldermen loudly proclaimed their intention of passing

[1] *Proceedings of the Board of Aldermen*, CLXXV: 237-9. [2] *Ibid.*, 556. [3] *Ibid.*, 481-7.

the grant over the mayor's veto,[1] E. M. Knox and H. K. Thurber, two taxpayers, procured an injunction from Judge Donohue restraining them. This injunction was removed in the course of a few days; and on August 30, the board of aldermen at a special, almost secret meeting, passed the grant over the veto. The audacity and corruption of this move aroused the people. A mass meeting, the call for which was signed by the foremost men of the city, was held in Chickering Hall on the night of September 4. The movement developed into one to influence or force the board of aldermen to rescind its resolution of August 30.

On October 13, Mayor Edson sent an elaborate message to the aldermen, in which he gave additional reasons why the franchise should not be granted. By an agreement with the Broadway and Seventh Avenue Railroad companies, the petitioner (Jacob Sharp) proposed to carry passengers from the Battery to Central park, each company to enjoy the common use of the other's tracks. By this arrangement the city would be defrauded of large sums annually, as was shown in the case of the common occupancy of certain tracks by the Bleecker Street and Fulton Ferry and the Twenty-third Street Railroad companies. Although they were distinct companies in law, yet they were controlled in reality by the same persons. The former was required to pay to the city one per cent of its gross receipts annually, while the other company obtained its franchise by the payment of a gross sum. The officers of the first company, wrote the mayor,

> hold and still hold that it is impossible for them to separate the receipts of one road from the other. Its conductors collect the fares received from passengers indiscriminately over the whole route. [In this way the city is juggled out of its revenues.] * * Should the application of the Broadway Surface Railroad Company be granted, there can, it seems to me, be no doubt that the same method will be followed in order to defeat the claim of the city to the percentage intended to be secured to it by law.

The Mayor then contrasted the list of officers of both roads, showing that they were practically the same. Thus:

Bleecker St. & Fulton Ferry R.R. Co.	*Twenty-Third St. R.R. Co.*
President—Jacob Sharp.	Jacob Sharp.
Secretary—Thomas H. McLean.	Thomas H. McLean.
Treasurer—David James King.	Lewis May.

[1] In its report, the railroad committee of the board of aldermen styled the mayor's veto as "in defiance of all decency," and as "in bad faith and unbecoming." *Proceedings of the Board of Aldermen*, CLXXVI: 988–9.

	Bleecker St. & Fulton Ferry R.R. Co.	*Twenty-Third St. R.R Co.*
Directors—	Jacob Sharp.	Jacob Sharp.
	Lewis May.	Lewis May.
	Eugene S. Ballin.	Eugene S. Ballin.
	Isaac Hendrix.	Isaac Hendrix.
	David James King.	David James King.
	John Downey.	John Downey.
	Henderson Moore.	Henderson Moore.
	S. B. H. Vance.	S. B. H. Vance.
	Thomas B. Kerr.	L. Marx.
	Joseph Jacobs.	Lazarus Rosenfeld.
	John H. Selmes.	James Lynch.
	Alexander E. Kursheedt.	John R. Flanagan.
	William Mangris.	James Flanagan.

He estimated that the first year the net annual income of the Broadway Surface Railroad Company would be little short of $400,000, which is the gift solicited at your hands by the promoters of this scheme. Why should they, of all the million and a half inhabitants of this city have such an enormous fortune conferred upon them at the expense of their fellow citizens?

SHARP SUCCESSFUL.

Protests reached the mayor and the aldermen from many quarters. A. B. Miller and others representing the New York Board of Trade announced their opposition to a railroad of any sort on Broadway. Public opposition had become so great that both the aldermen and the company thought it wise to make concessions. The company reckoned the franchise was cheap at almost any price. Had not the rival corporation tried to bribe the aldermen with $750,000—$250,000 more than itself had paid—, and then offered a million dollars to the city for the privilege? The board of aldermen, therefore, on November 13, rescinded its resolution of August 30 and gave its consent anew to the Broadway Surface Railroad Company to construct a horse railroad on Broadway from the Battery to Union square, as "public necessity requires the construction of a railroad on Broadway." The fare was to be five cents for the whole route. The company was required to pay to the city treasury, to the credit of the sinking fund, on November 1 for five years, three per cent of its gross receipts, and after five years a like annual payment of five per cent of its gross receipts. In addition, the payment of $40,000 a year was exacted.

Mayor Edson vetoed this resolution eleven days later.[1] On

[1] *Proceedings of the Board of Aldermen*, CLXXVI: 777-784.

December 5, the board of aldermen passed the resolution over the mayor's veto. Thus, after trying first in 1852 and every little while thereafter, Jacob Sharp finally succeeded in getting control of Broadway.[1]

ALDERMEN TRIED AND CONVICTED.

The corruption of this board of aldermen was such it came to be known as "the Boodle Board." The sequel is well known. Aldermen Duffy, Fullgraff and Waite turned state's evidence. Alderman Henry W. Jaehne was convicted on his own confession and sentenced by Judge Barrett on May 20, 1886, to penal servitude at hard labor for the term of nine years and ten months, for having received a bribe of $20,000 for his vote. Alderman "Honest" John O'Neill was sentenced by Judge Barrett on February 12, 1887, to imprisonment at hard labor in the state prison for four years and a half, and to pay a fine of two thousand dollars. Alderman Arthur J. McQuade was sentenced by Recorder Smythe on December 20, 1886, to seven years in the state prison for bribery and to return five thousand dollars of bribe money to the city. He was released from Sing Sing prison on October 4, 1888, and on July 20, 1889, after a new trial in Balston, N. Y., was acquitted. Jacob Sharp was sentenced by Judge Barrett on July 14, 1887, to four years in the state prison, and to pay a fine of five thousand dollars. He obtained a stay and new trial, but died on April 5, 1888, before the retrial was held. Aldermen Keenan, DeLacy, Dempsey, Rothman, Sayles, and Moloney fled to Canada and other parts. Aldermen Farley, Finck, Kirk, Miller, Pearson, Reilly, Shiels, Wendel, Cleary, and Richmond were indicted, but on May 19, 1891, the last of these indictments was dismissed. Of Sharp's associates in the company, twelve were tried and acquitted, and Forshay died before trial.

The reason only two of the bribe takers and givers were punished was explained by Col. John R. Fellows, the District Attorney who tried the cases. He stated to the "Fassett Committee" that convictions could not be secured because public sentiment had changed. The storm had subsided; the subject matter had grown old and people had largely become tired of it; and many former opponents of the franchise had come to look upon it

[1] The charter of the Broadway Surface Railroad Company was annulled by the state legislature in 1896. The court of appeals, however, held that the franchise or interest in the street was perpetual and indefeasible; that it survived the corporation, and was vested in the directors as trustees for the creditors and shareholders.

as a great improvement.[1] There was considerable basis for this statement, but from time to time hints were heard that political influence was potent in saving the remainder from prison.

MOTIVE POWER CHANGED.

In 1889 the Broadway Surface Railroad Company sought a change of motive power, from horse to cable. Understanding the popular bitterness against it, it adopted evasive tactics and applied to the legislature for what it feared to ask from the city. The legislature passed the act and the local authorities disputed its validity. Finally, the company submitted to the jurisdiction of the municipal government and made an agreement to pay to the city an annual rental of $150,000, exclusive of the amount paid for licenses, fees and taxes. The city officials prided themselves on having forced a new agreement advantageous to the city. But Walton Storm, sometime chairman of the finance committee of the board of aldermen, was forced to acknowledge before the Fassett Committee in 1890 that the yearly increase in the Broadway passenger traffic was such that under the old arrangement the company would soon have had to pay $150,000 yearly under the old five per cent basis.[2] Colonel Fellows likewise testified that New York city, so far as its treasury was concerned, was no better off than if the corrupt bargain had not been made.[3]

APPLICATIONS REFUSED.

The rush for railroad franchises of a most sweeping character continued. An application of August 6, 1884, from the Broadway, Lexington and Fifth Avenue Railroad Company, sought to run from the Battery through Broadway to Fourteenth street, thence through other streets, to Lexington avenue to One Hundred and Thirty-first street. Reaching Harlem, the company sought to lay its tracks on a network of streets there, and then run on Fifth avenue among other streets, from One Hundred and Twentieth to Sixtieth streets. For this franchise the company made no bid, inserted no terms, evidently relying upon the aldermen to state their own terms. The application was referred to the committee on railroads and heard of no more.[4] The Third Avenue Railroad Company also made applications but ineffectively.

[1] *Report of the Senate Committee on Cities*, 1890, 3:2667–2668.
[2] *Testimony, Senate Committee on Cities*, 1890, 1:581–582. [3] *Ibid.*, 2:2668.
[4] *Proceedings of the Board of Aldermen*, CLXXV: 226–228.

One offered no compensation to the city to run a railroad mainly on Lexington avenue and Ninety-seventh street, thence to the Harlem river,[1] and another to extend its tracks on Park row to Vesey street, to Church street, to South ferry. The sole terms offered were that the company would carry passengers for a single fare.[2] Another company sought the right to run a railroad through Thirty-eighth and Thirty-ninth streets. The aldermen likewise refused to grant this.[3]

EXTENSIONS PERMITTED.

Other railroad companies, however, experienced no difficulty in bringing arguments to bear upon the majority of the board of aldermen to grant them railroad franchises or extensions. By a vote of 21 to 2, Aldermen Grant and O'Connor alone opposing, the board gave permission to the Bleecker Street and Fulton Ferry Railroad Company to extend its road through Mail street and connect with the Broadway railroad. This seemingly was a minute and unimportant extension, but it effectually furthered the elaboration of a gridiron system of railroads which Sharp and his associates had in view. Mayor Edson vetoed this ordinance on September 5, on the ground that the provisions contained no compensation to the city. The board of aldermen passed it over his veto.

The aldermen likewise passed a resolution granting a franchise to the Chambers Street and Grand Street Ferry Railroad Company, to operate on these and other streets. Mayor Edson vetoed this ordinance on December 8, stating as his reasons that the great value of such a franchise was beyond the mere percentages required by law, that the entire line along the route was thoroughly built up, that the city would receive practically no compensation, and that the privilege should be sold to the highest bidder.[4] Judge Miles Beach, in the court of common pleas, issued an injunction restraining the aldermen from granting this franchise, but they passed the resolution over the mayor's veto, on December 30, 1884, by a vote of 22 to 2—Aldermen Grant and O'Connor voting in the negative.

The aldermen likewise permitted the Forty-second Street, Manhattanville and St. Nicholas Avenue Railroad Company and the Second Avenue Railroad Company to extend their lines on

[1] *Proceedings of the Board of Aldermen*, CLXXVI: 471–473.
[2] *Ibid.*, 182–183. [3] *Ibid.*, 187. [4] *Ibid.*, 1016–1019.

certain streets, and gave a franchise to the Thirty-fourth Street and Eleventh Avenue Railroad Company to lay tracks on Thirty-fourth street from the North to the East river, on Eleventh avenue from Thirty-fourth to Forty-second street, to connections with the ferries at West Forty-second street. The only compensation required was the ordinary and statutory one of three per cent. on the gross receipts. Still another franchise was granted by the aldermen in December, 1884, to the Fifty-fourth Street Railroad Company by a vote of 15 to 9, and went into effect without the mayor's approval.

MAYOR GRACE'S ADMINISTRATION.

In his first message Mayor Grace dealt with the franchise question, and following the example of his predecessors urged that all franchises should be put up at public bidding at a sufficient upset price, and that there should be prompt annual payment into the city treasury of a fair percentage upon the gross receipts. He alluded to the license fees due the city which for years had been unpaid. With accumulated interest they amounted to $839,695.40.[1] On January 17, 1885, Mayor Grace sent a communication to Corporation Counsel Lacombe, asking him to protect the rights of the city and calling his attention to the grants made the preceding year without any adequate or just compensation to the taxpayers of the city. In most cases the companies had not secured the consent of the property owners. Application, therefore, had been made to the general term of the supreme court for the appointment of commissioners to determine whether such railroads ought to be constructed.

Mayor Grace's energetic representations seemed to have effect, for on one day—February 9, 1885—, the aldermen revoked resolutions granting franchises to the Broadway Surface Railroad Company, the Bleecker Street and Fulton Ferry Company, the Chambers Street and Grand Street Ferry Railroad Company and the Fifty-fourth Street Railroad Company. However, all survived.

The aldermen contained themselves for a few months. But applications for franchises again poured in, and on July 24, 1885, a franchise was granted to the Fulton, Wall Street and Cortlandt Ferries Railroad Company to construct and operate a surface railroad on Fulton, South, Liberty, Cortlandt, William,

[1] *Proceedings of the Board of Aldermen*, CLXXVII:38-39.

Pine, Maiden lane and other streets, by a vote of twenty-two to two. Among the twenty-two were Jaehne, Cleary, DeLacy, Finck, Hartman, McQuade, Reilly and Rothman, who were indicted, sentenced to prison, or fled to avoid trial when the revelations touching the Broadway franchises were made in 1886. The company was to pay three per cent of its gross receipts for the first five years, and five per cent for all subsequent time.[1] This resolution became a law without the mayor's signature.

The city had grown so rapidly above the Harlem that attention was now turned in that direction. The Brook Avenue Railroad Company applied for permission, without offering terms, on August 17, 1885, to lay and run a surface line on North Third Avenue, the Southern Boulevard, Lincoln, Brook, Robbins, Forest and Union avenues and other important thoroughfares above the Harlem.[2] The Harlem Bridge, Morrisania and Fordham Railroad Company applied for permission to extend its line on Morris and Cortlandt avenues to One Hundred and Sixty-first street, as also on Mott, Sedgwick, Jerome and Gerard avenues. The committee on streets effectually shelved this application, as also that of the Morris Avenue Railroad Company to operate on North Third avenue, Lincoln, Morris, Cortlandt, Teller and Webster avenues, the Kingsbridge Road and other streets.

Four applications, however, were acted upon favorably—those of the Thirty-fourth Street Ferry and Eleventh Avenue Railroad Company, the Houston, West Street and Pavonia Ferry Railroad, the St. Nicholas Avenue and Crosstown Railroad, and the Madison Avenue and Eighty-sixth Street Railroad extension. Mayor Grace vetoed each of the resolutions, on the ground

> that the minimum amount fixed by the statute which is payable into the city treasury and for the payment of which provision has of course been made, is much less than the real value of the proposed privileges.

The first of these measures was passed over his veto by a vote of 23 to 1, and an attempt was made to pass the other three likewise, but to the general surprise they were defeated on December 22, 1885.[3]

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[1] This railroad has never been built, though the company owning the franchise makes yearly reports to the state railroad commission. It has issued $687,000 of capital stock. (See *Report of the State Railroad Commission*, 1897, pp. 1381–1342.

[2] *Proceedings of the Board of Aldermen*, CLXXIV: 704–707. This application was referred to the committee on streets and suppressed there.

[3] *Proceedings of the Board of Aldermen*, CLXXX: 1183–1199.

CABLE ROAD JOB.

The cable railroad "job," which proposed to give to a newly-organized railroad company seventy or eighty miles of streets, came near being successful, being defeated by a tie vote of twelve to twelve.[1] But the following year, the committee on railroads submitted a favorable report. The committee regretted that it had to obtain compensation for the franchise. The working men wanted cheap fares,

while the people at large demand that these franchises shall be encumbered by no burden or limitation except the greatest extent of desirable service for the least fares—that all public auctions of these franchises shall be restricted to only such burden and limitation.

It was a question, went on the report, between the taxpayers who owned lands and tenements, and the classes who rented them, and who practically bore every burden of taxation.

Your committee has, however, in deference to the suggestion of Mayor Edson's Rapid Transit Commissioners, reluctantly decided to acquiesce in the suggestion that the Cable Company pay as a consideration for its franchise 2½ per centum of its annual earnings into the City Treasury.[2]

Thereupon, by a vote of nineteen to four, twenty-nine separate routes on the most desirable thoroughfares in the city were given to the Cable Company. The grant allowed both surface and elevated routes. On March 16, 1886, Mayor Grace sent in a veto, for he did not consider two and one-half per cent a sufficient consideration, and suggested:

Let the city instead of being a grantor, become a lessor of street railway privileges; let the commissioners of the sinking fund lease all franchises at public auction for a term not less than ten nor more than twenty years. Let the person taking the franchise receive all profits on the operation of the road up to ten per cent on the actual investment for the construction and equipment; all sums earned in excess of such ten per cent to be paid quarterly into the city treasury. At the expiration of the lease, let the franchise be re-let, as is now done with ferry franchises, and in case it be let to new parties, let the city pay the old lessees the estimated cost of replacing the plant, charging a like sum to the new lessees who shall be represented in the apportionment.

As the aldermen made preparations to pass the cable road resolution over the Mayor's veto, four separate injunctions were obtained. An ineffectual attempt then was made to influence the legislature to pass it. At this stage the inner transactions of the board of aldermen of 1884, touching the granting of the Broadway Surface Railroad franchise, were made public in the criminal courts, with the results described above. The severity of the

[1] *Proceedings of the Board of Aldermen*, CLXXX: 1183–1199.

[2] *Ibid.*, CLXXXI: 474–488.

sentence passed on Henry W. Jaehne, the first one convicted, startled the board of aldermen. Prison was a new experience for them, and they became as terrified as they had been flippantly audacious. Month after month passed without the word franchise being heard in the aldermanic chamber and the "cable job" fell through.

Other applicants met with varying experiences. The first franchise granted in 1886 was one to the Southern Boulevard Company, to operate on a number of important thoroughfares above the Harlem. On March 2, 1886, Mayor Grace sent in his veto, his objection being that railroad franchises should be put up at public auction.[1] On that very day, by a vote of 14 to 10, the Houston, West Street and Pavonia Ferry Railroad Company was granted the right to extend its road on West and other streets; by a vote of 13 to 12, the Madison Avenue and Eighty-sixth Street Railroad Company the right to extend its road to the Hudson river and elsewhere; and by a vote of 15 to 10, a franchise for a road on St. Nicholas avenue, Manhattan avenue, Twelfth avenue, Second avenue and a number of crosstown streets was conferred on condition that the company pay three per cent of its gross receipts to the city. All three grants were vetoed by the mayor. Then came the exposures and franchise grants were out of season.

Suddenly, on November 30, 1886, the board again resumed activity and passed grants for the Twenty-eighth and Twenty-ninth Street, and the St. Nicholas Avenue railroads, over the mayor's vetoes and against the remonstrances of various bodies. On December 30 it passed a resolution over the mayor's veto allowing the North and East River Railroad Company to operate by electricity. But a resolution giving a franchise to the Melrose and West Morrisania Railroad Company vetoed by the mayor was not repassed.

To prevent a repetition of the Broadway scandal, the legislature in 1886 passed what was commonly known as the Cantor Act. This compelled the sale of street railway franchises at auction in all incorporated cities and villages, except in the case of companies then organized in places of less than 40,000 inhabitants. The lowest compensation allowed by the Act for cities of 250,000 or more inhabitants was the same as previously fixed—three per cent of

[1] *Proceedings of the Board of Aldermen*, CLXXXI: 497–498.

the gross receipts for the first five years, and five per cent afterwards. In 1892 the application of this Act was limited to New York.

HUCKLEBERRY ROAD.

The first franchise granted after the enactment of the Cantor law was for the "Huckleberry" road.[1] Taking advantage of the movement in the annexed districts of the city for local improvements, several promoters and speculators secured the consent of the property owners for the right of way for a surface horse railroad over the most important streets in that section. The projected railroad, in fact, covered more than 100 miles, and extended through such places as Williamsbridge, West Farms, Williamsburgh, Mount Vernon and a number of other villages and districts. The board of aldermen granted the desired franchises.

In 1891–92 some politicians secured control of the company. A bill was lobbied through the legislature, effacing certain features objectionable to owners of the franchises in the law of 1866, under which the consent of the property owners had to be obtained again if the road was not built in a certain time.

A bill was also passed consolidating with the new road the Harlem Bridge, Morrisania and Fordham Railway Company, the North Third Avenue and Fleetwood Park Company, the Melrose and West Morrisania Railroad Company, under the name of the Union Railway Company, with a speciously-worded charter that practically exempted the company from paying to the city any percentage on its income. Under this act the company is required to pay one per cent of its gross receipts whenever such receipts during any period of six months exceed $1,700. The law has been so interpreted that the falling of any one day's receipts below $1,700 will relieve the company from payment for the entire six months. Thus the Union Railway Company had not paid up to 1900 anything to the city.

After having worked a portion of its system a short time, permission was secured to change to the overhead trolley system. This has further increased the value of the franchise which is now regarded as being worth at least two million dollars. Thus to certain individuals by simple act of law was presented a gift of over two million dollars.

When the persons most instrumental in originally securing the

[1] For the most part the district to be traversed was unimproved, and from the profusion of huckleberry bushes along the route arose the nickname of the road.

consents for the road found that powerful politicians had gotten possession of the stock, they applied to the board of aldermen and obtained new franchises for 100 miles of streets paralleling as far as possible the Huckleberry route. But as there are few or no buildings on these, the franchise at present is of little value. The "Huckleberry" company has since brought eight or ten suits, which have effectually prevented its rivals from operating. The Third Avenue Railway Company obtained control of the Union Railway Company in January, 1898.

METROPOLITAN STREET RAILWAY.

Before 1893 every railroad company operated independently, although several were managed practically by the same officers. On November 29, the Metropolitan Street Railway Company was formed by the consolidation of the South Ferry Railroad Company, the Broadway Railroad Company, the Chambers Street and Grand Street Ferry Railroad Company and the Houston, West Street and Pavonia Ferry Railroad Company. In 1894 and 1895 it formally absorbed the Metropolitan Crosstown Company, which had been organized in 1889 to construct a surface railroad from the Grand Street ferry, East river, through Delancey, Spring and other streets to the foot of West Fourteenth street, and the Lexington Avenue and Pavonia Ferry Railroad Company, which was organized on December 23, 1892, for the purpose of acquiring at public sale the proposed extension of the Houston, West Street and Pavonia Ferry Railroad Company, on Lexington avenue north of Forty-second street, and on One Hundred and Sixteenth street from Morningside park to the East river. Previously, the railroad companies whose lines ran on the longitudinal streets had been influential enough to prevent any rival company from dividing traffic with them. The Metropolitan Street Railway Company, however, proved more mighty than a number of independent companies, and was able to get the new franchises under the form of extensions. The Lexington Avenue line pays 3½ per cent of its gross receipts on certain parts of its line and 3 per cent on others.

At the same time there was included in the combination the Columbus and Ninth Avenue Railroad Company, which was organized to acquire at public sale the proposed extension of the Ninth Avenue railroad from Sixty-fourth street along Columbus avenue to One Hundred and Tenth street, with a short branch on

One Hundred and Sixth street, in all not quite four miles. It later was lengthened by a series of extensions to 7.44 miles. This is another instance where the extension was in effect more valuable than the original franchise, since it not only tapped a most populous section of the city, but allowed a continuous route through densely settled districts, from the Battery to the Harlem on the west side, just as it permitted a similar route by way of Lexington avenue on the east.[1]

Other roads leased to the Metropolitan Traction Company in various years were the Broadway and Seventh Avenue railroad, the Sixth Avenue railroad, the Ninth Avenue railroad, the Twenty-third Street railway, including its leased line—the Bleecker Street and Fulton Ferry railroad; the Forty-second Street and Grand Street Ferry railroad, the "Belt line" roads, the Eighth Avenue road, the Fourth and Madison Avenue surface line of the New York and Harlem railroad, the Central Crosstown road, the Second Avenue, the Thirty-fourth Street Crosstown railway and the Fulton Street railroad.

LENOX AVENUE GRANT.

An extension which called forth public protests was what was technically known as the "Sixth Avenue extension." On April 24, 1894, the board of aldermen passed a resolution in that peculiar aldermanic phraseology which made it appear as though the city was exacting favors from a corporation, requiring the Sixth Avenue Railroad Company as soon as practicable to construct and operate its railroad on Lenox avenue from One Hundred and Tenth street to the Harlem river. Three days later this resolution was approved by the mayor. As both the Sixth and Eighth Avenue railroads were now leased by the Metropolitan Street Railway Company, this extension was but another step towards acquiring every available street.

The manner of passing this resolution and the failure of the aldermen to secure to the city even the slightest compensation for what was without doubt a new franchise evoked much criticism and some scandal. As is well known, Sixth avenue is cut off at Fifty-ninth street by Central park, and only by a gross stretching of actual facts could a railroad on Lenox avenue, two and a half miles from where Sixth avenue properly ends, be called the Sixth avenue extension.

[1] Various extensions were authorized by c. 676, Laws of 1892.

In the application to the supreme court in 1897 for an injunction seeking among other things to have this grant declared void, Alexander Hadden declared that the Sixth Avenue Railroad Company did not obtain the consent of the owners of one-half in value of the property fronting on Lenox avenue as required by section ninety one of the railroad law and the constitution of the state; that the resolution was passed without any application in writing therefor, and without any publication of any notice or of the time and place when the common council would consider the resolution as required by section ninety-two; that the franchise was not sold at public auction as required by law; and that in other respects the grant was illegal. Mr. Hadden contended that the continued and exclusive operation in perpetuity of the Lenox Avenue Railroad was of great value. For a similar privilege for a cable railroad on Broadway, south of Fifteenth street, an income of $150,000 a year was guaranteed to the city, and if it had been sold at public auction, the city would have realized in addition to the three and five per cent on gross receipts, as provided by law, a bonus of many thousands of dollars. Furthermore, Mr. Hadden charged that the board of electrical control never granted permission to the company to lay underground conduits on Lenox avenue.[1] The Metropolitan Street Railway Company, however, has never been disturbed in the possession of Lenox avenue, which unlike the Columbus and Lexington avenue extensions, does not yield even a percentage of gross receipts to the city.

MOVEMENT FOR PUBLIC OWNERSHIP.

The rivalry between the Metropolitan and the Third Avenue Railroad Company to secure new franchises developed the important fact quite unknown to the public that in granting the charter for the Sixth and Eighth Avenue railroads, the city reserved the right to purchase these roads at cost plus ten per cent. The Metropolitan Street Railway Company having leased these roads applied for permission to change the motive power to underground electricity.

The privilege of making the change was considered by a number of public men as virtually a new franchise.[2] The New York Board of Trade and Transportation and other bodies and citizens

[1] In the *Proceedings of the Board of Aldermen*, CCXXVI: 266-268, Mr. Haddens' application for an injunction is printed in full.

[2] See communication received by the board of aldermen from the New York Board of Trade and Transportation. *Proceedings of the Board of Aldermen*, CCXXVI: 235-6.

urged the board of aldermen to take advantage of the opportunity and secure the railroad to the city. On April 7, 1897, Henry J. Barker, who was credited with acting on behalf of the Third Avenue Railroad Company, offered the sum of a million dollars for each of the franchises (taking either or both) to be paid in cash on receipt of the proper resolution. In addition Mr. Braker offered to pay what the city would be required to pay the owners—the cost of construction and ten per cent additional—as required by the original charter. Furthermore, Mr. Braker guaranteed to pay three per cent of the gross receipts annually for the first five years, and five per cent after that, payment in no year to be less than fifty thousand dollars on each road.[1]

Besides Mr. Braker's offer, the Third Avenue Railroad Company made an additional proposition to lease the road for an annual rental of ten per cent of the cost of purchase and five per cent of the gross receipts, the rental not to fall below $100,000 a year. Other propositions, according to the *City Record* of May and June, 1897, were made to the city, one offering $2,000,000 and percentages averaging $100,000 a year besides the amount necessary to buy the existing tracks in addition.

The New York Board of Trade and Transportation represented to the board of aldermen the feasibility of securing municipal ownership of the two roads. The cost, it set forth, as reported to the state railroad commissioners in 1895, was $621,605 for the Sixth Avenue road and $655,181 for the Eighth Avenue road. In leasing these roads the Metropolitan Street Railway Company paid $145,000 a year for the Sixth Avenue and $215,000 a year for the Eighth Avenue road. This made a valuation, on a capitalization of five per cent, of $2,900,000 for the Sixth Avenue, and $4,300,000 for the Eighth Avenue road. The city would thus get for about $1,400,000 property worth $7,200,000.[2] But to no avail.

At present the Sixth and Eighth Avenue Railroad companies pay no more to the city than the annual $50 license fee per car for operating nearly thirty-three miles of highly profitable lines.[3] All the roads operated by the Metropolitan Street Railway in 1899 amounted to 217.43 miles, of which 49 miles were owned and 168.43

[1] *Proceedings of the Board of Aldermen*, CCXXVI: 243–244 and 258–259.

[2] *Ibid.*, 79–80.

[3] See report for the bureau for the collecting of city revenue, department of finance, Borough of Manhattan, 1898.

miles leased.[1] About 23 miles were operated by cable, a large part by underground electricity, while a few by horses. Very soon all the lines will be operated by underground electricity or compressed air.

GRANTS SOLD AT AUCTION.

The last franchise secured by the Metropolitan Street Railway Company was granted on December 5, 1899, under the title of the Fort George and Eleventh Avenue Railroad Company by the board of estimate and apportionment with the consent of the municipal council, to run a double track railway on the Boulevard from One Hundred and Thirtieth street to One Hundred and Eighty-second street and also from the Boulevard along One Hundred and Forty-fifth street to the new power house of the company. It was proposed at first to pay the city three per cent of gross receipts for the first five years and five per cent for the next twenty years, but Comptroller Coler and other officials believed there ought to be a continuous increase in payment to the city. Finally, these terms were fixed: no cash payment to the city; four per cent of gross receipts for the first five years; six per cent for the next five years; eight per cent for the third term of five years and ten per cent for the remaining ten years of the twenty-five year grant. The franchise is to be renewed at the end of twenty-five years on a reappraisement of value.

KINGSBRIDGE FRANCHISE.

In its efforts to extend its system, the Third Avenue Railroad Company sought and obtained in the fall of 1895 a franchise for the Kingsbridge road, extending from One Hundred and Twenty-fifth street to Yonkers, for thirty-eight and one-half per cent of the gross receipts, in addition to the statutory minimum, and a cash bonus of $250,000. The Metropolitan Street Railway Company fought the grant, and the sale was set aside by the courts on the technical grounds that the extension in reality consisted of two separate routes and that the cash bonus was unwarranted by statute. Thereupon the Third Avenue Railroad Company bought the Forty-second Street, Manhattanville and St. Nicholas Avenue Railroad Company, and prepared a franchise ordinance for the streets included in the previous unsuccessful grant but now asked for as an extension of the Manhattanville line.

On September 27, 1897, it was reported that the board of

[1] Nicholl, *Manual of Statistics*, 1899, p. 567.

aldermen intended to award the franchise to the Third Avenue Railroad Company, and it was likewise whispered that the grand jury was prepared to act. Alderman Charles A. Parker, chairman of the committee on railroads, charged that the Metropolitan Street Railway Company had promised a large contribution to Tammany Hall if its members in the board of aldermen prevented the awarding of the franchise. The Tammany men for the most part favored the Metropolitan Street Railway, and the Republicans, its rival. It was alleged that the Third Avenue Railroad Company discharged a number of employes who had been placed in their positions through the influence of Tammany aldermen as a warning, and that a general dismissal of such men would take place unless the Tammany aldermen ceased opposition. The story went that every alderman who was opposed to giving the franchise to the Third Avenue Railroad Company was approached directly and indirectly, and where promises did not succeed, threats were used.

The aldermanic committee on railroads reported in favor of awarding the franchise to that company without delay. The railroad was an imperative necessity, the report stated, and demanded by public needs. The company had already expended hundreds of thousands of dollars in railroad material and equipment for the "extension." It had been placed in "an unjust position" by the "illiberal mandamus proceedings which involved the company in heavy expense pending the consideration of the application by this board." The New York *World*, basing its action on section seventy-three of the new charter, secured a taxpayer's injunction against the grant, an injunction later upheld by the appellate division of the supreme court.

The proposed Kingsbridge franchise was allowed to slumber for nearly two years. In the meantime, growing tired of constantly fighting, the two rival companies came to an understanding, especially after their experience with the Amsterdam avenue franchise in 1899.[1] In consideration of the Metropolitan company being allowed to use the tracks of the Third Avenue Railroad Company on the Boulevard from Fifty-ninth to Sixty-sixth streets

[1] The Third Avenue Company attempted to construct a second set of tracks with cars operated by underground trolley parallel to the tracks of the Metropolitan Street Railway Company, making four tracks on Amsterdam avenue. To obtain possession the Third Avenue Company hurriedly laid considerable track without authority. Extended agitation and a local uprising resulted in the enactment of a law prohibiting four tracks.

and to have exclusive use of One Hundred and Forty-fifth street, the former company withdrew opposition to the Kingsbridge project. Accordingly the railroad committee of the municipal assembly reported favorably; the municipal assembly passed a resolution, which was signed by Mayor Van Wyck, referring the application as required by the charter to the board of estimate and apportionment. This body acted on it December 5, 1899, granting to the Third Avenue Railroad Company the right to lay double tracks on the Boulevard from Manhattan street to One Hundred and Sixty-ninth street, thence over the Kingsbridge road to Spuyten Duyvil creek and Two Hundred and Thirtieth street to Riverdale avenue and along that avenue to the city line. The terms were the same as those asked for the Fort George and Eleventh avenue franchise, with the added provision that the Third Avenue Railroad Company should give a five cent fare over all its lines, on those of the Union Company which it controls, and on those to Yonkers.

RECENT GRANTS.

At the same time that the Kingsbridge road franchise was originally granted, a sale of a franchise for a similar route in the extreme upper portion of the city was held. Of three bidders, one dropped out; the remaining two kept up the bidding, until nearly forty per cent had been bid. To the surprise of all, the People's Traction Company suddenly offered the entire receipts. Not to be outdone, the rival corporation offered 100 per cent and the statutory minimum. The bidding was continued with such vigor that finally the People's Traction Company offered 6,975⅟ per cent. When these facts became known, no little ridicule and comment was excited; some kind of design was thought to be veiled under it. But the next day both corporations were ready to continue the bidding. The third corporation, however, stepped in and obtained an injunction against the continuance of the sale. After a year's litigation, the franchise was awarded to the People's Traction Company for 100 per cent of the gross receipts. The line was needed, the People's Traction Company explained, as a connecting road with one proposed beyond the city limits, and it accused its competitors of acting in the interest of the Huckleberry road. But no payment has yet been made.

The year 1897 was fruitful in scandals dealing with the proposed giving away of valuable franchises with little or no considera-

tion for the city. The Pelham Bay Park Railroad Company made application for a franchise for a surface railroad on the finely paved boulevards traversing Pelham Park. In November, 1897, the aldermanic committee on railroads reported these conditions: (1) That the franchise be sold at public auction, and that a fare of no more than five cents be charged; (2) That the company should keep the streets between the tracks and for two feet beyond the outer rail on each side in repair, and should pave between the rails;[1] (3) That at the end of twenty-five years, after a revaluation, the company should have the privilege of acquiring the same rights by paying the additional valuation, or that in case the city or some other corporation should procure them, the Pelham Bay Park Road Company was to be reimbursed the amount of the cost of building this railroad.[2]

The railroad committee apparently yielded to the provisions of the new charter and the spirit and wishes of the community in setting a time limit to the franchise, but that it was the deliberate intention of the great majority of the aldermen to grant the franchise in perpetuity was plain when several amendments were adopted by a vote of twenty-five to three. One of them read that if the court decided that under the new charter the aldermen had no right to grant the franchise in perpetuity, then the consent should be for twenty-five years. A later amendment, which was likewise adopted, provided that if the courts should decide that the power of the board of aldermen had not been limited by the provisions of the charter, then the consent should be in perpetuity.[3] This action was taken on the plea that the road "would be a great public benefit, and a convenience to the people of that section." Influenced by the public outcry over this action, Mayor Strong, on December 14, 1897, vetoed the resolution on the ground that many

[1] This customary regulation as a rule meant nothing. Perhaps it is pertinent to quote a report made by General Collis, commissioner of public works under Mayor Strong. He complained of the failure of the surface railroad companies to observe their obligations to the public. They either, he wrote, absolutely refused to join the department of public works, or delayed in joining it, claiming exemption under the very lax conditions of old franchises. The result was that on some miles of streets the department had laid new pavements on each side of the tracks, while the most valuable space for traffic inside the tracks remained in the old dilapidated condition. From 1889 to 1895 the city expended $708,878 in repairing in and between the rail tracks and held (in 1897) that amount of claims against the railroad companies. That sum, General Collis estimated, would pay for 256,000 square yards or 14¼ miles of new asphalt pavement, which was much needed for public benefit. *Proceedings of the Board of Aldermen*, CCXXV: 275–276.

[2] *Proceedings of the Board of Aldermen*, CCXXVIII: 862. [3] *Ibid.*, 863.

legal complications had arisen concerning the franchise. The decision, however, of the appellate division in the Kingsbridge case, settled the Pelham grant.

THE GREATER NEW YORK CHARTER.

On May 4, 1897, Governor Black signed a new charter for Greater New York. While not radical enough to please the advocates of municipal ownership, its provisions were progressive. Section seventy-three, although prohibiting the granting of any franchise for a period longer than twenty-five years, authorized the municipal assembly to provide for giving to the grantee the right on a fair revaluation to renewals not exceeding in the aggregate twenty-five years.[1] Such grant may provide that upon the termination of the franchise, the plant, as well as the property of the grantee in the streets, avenues, parkways and highways, with all appurtenances, shall become the property of the city without further or other compensation to the grantee; or that there shall be a fair valuation of the plant and property, which shall be transferred to the city upon the payment of this valuation to the owner, exclusive of any value for the franchise.

Furthermore, if by virtue of the grant or contract, the plant and property are to become the city's without money payment, the city shall have the option of either taking and operating the property in question on its own account or of renewing the grant for a period not exceeding twenty-five years upon a fair revaluation, or of leasing it to others for a like term. If the city pays for the plant and property, it shall operate them on its own account for at least five years. After that it may determine either to continue the operation on its own account or to lease them for a limited period, as it leases ferries and docks. The city is compelled to make adequate provision under penalty to the grantees of forfeiture of the grant, or otherwise, to secure efficiency of public service at reasonable rates, and to have the property kept in good condition throughout the full term of the grant. The mode of deter-

[1] The legislature subsequently passed a special act supplemental to the charter, allowing the municipal assembly to grant franchises for the building of tunnels under land or water for fifty years, with the privilege of renewal for twenty-five years on its being represented that the expenditure in tunnel building was such as to justify an extension of the time limit. Under this statute various applications for franchises from tunnel companies to operate under the North and East rivers are pending before the municipal assembly as this is written.

mining the valuations and revaluations shall be specified in each grant or contract.

Section seventy-four directs that before any grant of the right to use any street, avenue, parkway or highway shall be made, the proposed specific grant embodied in the form of an ordinance with all the terms and conditions, including provisions as to rates, fares and charges, shall be published at least twenty days in the *City Record* and in at least two daily newspapers, at the expense of the proposed grantee. On the introduction and first reading of the ordinance, the municipal assembly is compelled to refer it to the board of estimate and apportionment, which shall investigate the money value of the franchise or privilege proposed to be granted, and whether the compensation proposed to be paid for it is adequate. No grant can be made by the municipal assembly, except on terms approved by vote or resolution of the board of estimate and apportionment entered on the board minutes. Every ordinance containing or making such a grant shall require the concurrence of three-fourths of all the members elected to each branch of the municipal assembly, and the approval of the mayor. Thirty days at least shall intervene between the introduction and final passage of such an ordinance. A vote of five-sixths of all the members elected to each branch of the municipal assembly is necessary to pass the ordinance over the mayor's veto. This act applies equally to any renewal or extension of the grant or leasing of the property to the same grantee or to others.

RECENT CONSOLIDATION OF COMPANIES.

The most recent phase of franchise history is the consolidation of the Third Avenue with the Metropolitan system. In 1899, the Manhattan Elevated Railroad Company and the Third Avenue Railroad Company, which to a certain extent had been competing lines and represented antagonistic interests, came to an agreement whereby for eight cents tickets good for transfer to the lines of the Third Avenue Company were sold at the stations of the Elevated road, and *vice versa*. This seemed to many to be the forerunner of a union of the two companies. But before there was sufficient opportunity for the rumor to be verified or proved false, other complications set in.

Following the example of the Metropolitan company, the Third Avenue Company had decided to substitute underground

electricity for cable and horse power. The work was nearing completion, when, in March, 1900, application was made for a receiver, after many attempts had been made to finance the outstanding obligations. Just what were the causes of the collapse, the public will never know, but within a year, Third Avenue stock fell from 240 to 46. It is currently believed that the company was systematically bled by the contractors who had charge of the introduction of electric traction. The original estimate for transforming certain lines was $12,000,000, but $32,000,000 has already been paid, and the work has not been completed. This is the price expended for permission to change motive power; for when the contract was to be let and the company preferred a certain contractor, it was given to understand that unless the contractor named by the party in power was employed, the work could not proceed. The threat was not an empty one. The city authorities have such powers through the granting of permits as to practically ruin any company or contractor. Thus politics and blackmail worked terrible ruin.

In the latter part of March, when the stock had fallen to 50 and thereabouts, the Metropolitan company purchased quietly in the open markets a controlling interest in the Third Avenue Company. The stock immediately went to par, and as this is being written, the Third Avenue system is undergoing reorganization so that it may be operated in harmony with Metropolitan. Thus what was predicted by far-seeing students for some time has been suddenly brought about. All the surface lines in Manhattan and the Bronx are now under one management; and we shall see, when we reach the chapter on Conduits and Subways, that a few men not only control the street railways, but also most of the electric illuminating plants, the electric subways, the telephones and the gas works.

In various places in the preceding pages, the conditions upon which street railway franchises were granted have been stated. It only remains to weave together these scattered threads and show what compensation the city actually receives for the valuable rights conferred upon private companies. (The following data have been prepared by the Bureau of City Revenue, for which I am greatly indebted to Comptroller Bird S. Coler and Collector David O'Brien.)

RECEIPTS FROM STREET RAILWAYS FOR THE YEAR 1899.

BOROUGHS OF MANHATTAN AND THE BRONX.

Name of Road or Company.	Miles of Track.	Motive Power.[1]	Compensation to City.[2]	Charter.[3]	Amount of Percentages.	Car Licenses.	Totals.	Remarks.
Broadway and Seventh Avenue R.R.	23.37	C.	5% g. r.; total to be not less than $150,000 per annum, and car license fees $50 p. a.	Broadway and Seventh Avenue, May 26, 1864; Broadway Surface to Battery and South Ferry, May 13, 1880; resolution of board of aldermen.....	$150,000	.....	$150,000	Paid Feb. 19th, 1900.
Metropolitan Street Railway.	.....	.....	$50 p. a.; Revised Ordinances of 1880.....	.....	.....	18,650	18,650	Consolidation of the Broadway and Seventh Avenue, Columbus and Ninth Avenue Railroads and the Lexington Avenue and Pavonia Ferry R. R.
Sixth Avenue R.R.	12.58	H. and E.	$50 p. a.	Sept. 6, 1851.....	.....	8,800	8,800	
Central Crosstown R.R.	4.19	H.	5% g. r.	C. 160, L. of 1873...	7,853.46	.....	7,853.46	
Chambers and Grand Street Ferry R.R.	5.13	H.	5% g. r.	C. 298, L. of 1884...	7,027.05	.....	7,027.05	
Central Park, North and East River R.R. (Belt Line)	26.00	H.	$50 p. a.	C. 511, L. of 1880...	.....	5,250	5,250	
Christopher and Tenth Street R.R.	4.50	H.	5% g. r.	C. 301, L. of 1873 ..	6,873.60	.....	6,873.60	
Dry Dock, East Broadway and Battery R.R.	20.25	H.	5% net proceeds and $50 for two-horse and $25 for one-horse cars.	Dec. 8, 1861.....	2,880.78	3,950	6,830.78	
Eighth Avenue R.R.	20.00	E.	$50 p. a.	Jan. 10, 1855.....	.....	5,250	5,250	
Forty-second Street and Grand Street Ferry R.R.	9.81	H.	$50 p. a.	Feb. 16, 1863.....	.....	2,000	2,000	
Forty-second Street, Manhattanville and St. Nicholas Avenue R.R.	24.90	H.	3% and 5% g.r.	Aug. 29, 1873.....	20,626.33	.....	20,626.33	
Houston Street, West Street and Pavonia Ferry R.R.	8.00	H.	$1,000 stipulated sum and $50 p. a.	.....	1,000	2,350	3,350	
New York and Harlem R.R. (Fourth Avenue)	19.28	E.	5% g. r. on extensions.	C. 283, L. of 1851; C. 325, L. of 1872	26,566.94	.....	26,566.94	Nothing on road from Astor House to Yorkville, built before 1873.
Ninth Avenue R.R.	16.00	H. and E.	$20 p. a.	July 29, 1859.....	.....	720	720	
Second Avenue R.R.	31.23	H. and E.	¼ of 1% g. r. of main line, 5% g. r. on extensions.	Jan. 21, 1853.....	9,179.24	.....	9,179.24	
Third Avenue R.R.	23.37	C.	$30 p. a.	Oct. 8, 1853.....	.....	.....	.....	In suit.

Union Railway	87.18	Tr	To pay 1% g. r. when average reaches $1700 per day for 6 months.	C. 340, L. of 1893	.....	.....	.....	Nothing paid.
Bleecker Street and Fulton Ferry R. R.	14.40	H	1% g. r. and car fees $50 p. a.	Nov. 3, 1885	2,082.99	1,500	3,582.99	
Fulton Street R.R.	2.00	H	5½% g. r.	C. 252, L. of 1884. C. 642, L. of 1886.	1,220.68	.....	1,220.68	
Metropolitan Crosstown R.R.	5.00	H	3% g. r. and 3% on extensions	C. 252, L. of 1884	13,449.57	.....	13,449.57	Watts street, Sullivan and Broome streets extension.
Metropolitan Crosstown R.R.	.....	H	.....	.....	740.96	.....	740.96	
Twenty-eighth and Twenty-ninth Street R. R.	6.48	H	3½% g. r.	C. 252, L. of 1884. C. 642, L. of 1886.	5,015.73	.....	5,015.73	
Thirty-fourth Street and Eleventh Avenue R.R.	5.06	H	3% g. r.	C. 252, L. of 1884	3,088.26	.....	3,088.26	
Columbus and Ninth Avenue R.R.	7.44	C	3½% g. r.	C. 676, L. of 1892	3,131.43	.....	3,131.43	
Lexington Avenue and Pavonia Ferry R.R.	6.70	C	3½% g. r	C. 676, L. of 1892	5,044.53	.....	5,044.53	
Broadway and Seventh Avenue R.R., extension of Lexington Avenue and Pavonia Ferry R.R.	.....	C	3% g. r., resolution of board of aldermen	C. 676, L. of 1892	294.84	.....	294.84	Twenty-third to Twenty-seventh street.
Houston Street, West Street and Pavonia Ferry R.R., extension of Lexington Avenue and Pavonia Ferry R.R.	.....	C	3% g. r., resolution of board of aldermen	C. 676, L. of 1892	607.98	.....	607.98	Twenty-seventh to Thirty-sixth street.
Houston Street, West Street and Pavonia Ferry R.R., extension of Chambers and Grand Street Ferry R.R.	.....	H	3% g. r., resolution of board of aldermen	C. 676, L. of 1892	660.74	.....	660.74	Pitt and Ridge streets.
Columbus and Ninth Avenue R.R., extension of main line	.....	C	3½% g. r., resolution of board of aldermen	C. 676, L. of 1892	295.98	.....	295.98	One Hundred and Ninth to One Hundred and Tenth street.
Ninth Avenue R.R., extension of Columbus and Ninth Avenue R.R.	.....	C	3% g. r., resolution of board of aldermen	C. 676, L. of 1892	187.76	.....	187.76	Seventh to Ninth avenue, on Fifty-third street.
Metropolitan Street Railway, extension of Columbus and Ninth Avenue R.R.	.....	C	3% g. r., resolution of board of aldermen	C. 676, L. of 1892	1,390.85	.....	1,390.85	One Hundred and Tenth to One Hundred and Sixteenth street.
New York and Hudson River R.R.	.....	.....	For 9 dummies at $50 each	.....	.....	450	450	
Central R.R. of New Jersey	.....	.....	For 1 dummy at $50	.....	.....	50	50	
Baltimore and Ohio R.R.	.....	.....	For 1 dummy at $50	.....	.....	50	50	
New York Elevated	.....	Steam	.....	.....	.....	.....	.....	Litigation.
Southern Boulevard R.R. Co.	.....	Tr	3% g. r.	C. 252, L. of 1884	1,257.85	.....	1,257.85	
			Total	.....	270,018.44	48,920	318,938.44	

[1] Abbreviations used in this column: C.=Cable; H.=Horse; E.=Conduit Electricity; Tr.=Trolley Electricity.
[2] Abbreviations: %=per cent; g. r.=gross receipts; p. a.=per car per annum.
[3] Abbreviations: C.=Chapter; L.=Laws.

CHAPTER VI.

RAPID TRANSIT.

The rapid growth of New York about the middle of the century, the opposition to steam railroads in the streets, the utter inadequacy of the surface lines to provide rapid transit, made all realize the need of other means of transportation. A number of abortive schemes attracted attention. The suggestion of an underground road met with much favor, and on January 31, 1867, a senate committee reported in favor of such a road, stating that to be the only speedy remedy and that elevated railroads erected on supports could not be fully adapted to the transportation of freight, However, at the opening of the session of the legislature in 1871. a carefully prepared bill for a viaduct railroad was presented. The applicants were men of responsibility and standing, and the one power they sought was the power to take the right of way on making reasonable compensation to the owners.

TWEED'S VIADUCT RAILROAD.

The "ring" members saw in this enterprise a scheme of value to them. They immediately altered the bill so as to vest the entire control in the hands of Tweed, Sweeny, Connolly, E. J. Shandly and others. By way of a disguise the names of a few men of integrity were inserted among the list of incorporators. Then they drafted a provision authorizing and compelling the city of New York to take $5,000,000 of stock.[1] Another clause allowed them to build other lines of railways in any part of the city or from the city into any other county, either on the level of the streets or any other way. This clause virtually enabled the ring to put a railroad in every street of the city.

There were, however, more surprising features of the scheme. By section thirty of the recently adopted city charter and senate bill 416 introduced but lately by Tweed himself, the owners of the franchise would have the power of swindling the city out of a sum of money, the extent of which no one could foretell.

[1] *Senate Journal*, 1871, pp. 482–483.

Under the former, the board of street openings consisting of Mayor Hall, Connolly, Tweed and the commissioners of taxes and assessments had the power to lay out, open, widen, straighten, extend, alter and close all streets and parts of streets and avenues below Fourteenth street. Under that section, it was asserted, the board purposed to make a street for the viaduct enterprise from Chambers street between Broadway and Chatham street (now Park Row) to Bleecker street and assess the whole expense upon the property they might deem benefited thereby. This alone would give the "ring" a widening job of at least ten or fifteen millions.

Now Canal street lay about thirty feet below the level of Chambers street at the City Hall. To build arches to avoid too steep a grade would be expensive. Senate bill 416 overcame this difficulty by giving Tweed alone absolute power to change existing grades and establish new grades for any or all the streets embraced within the area bounded by Chambers, Bleecker and Chatham streets, Broadway and the Bowery, the entire expense to be assessed by the board of assessors upon the property intended to be benefited thereby. Under this insignificant section of an apparently harmless bill, Tweed could expend fifty millions of dollars and saddle the whole of it as a first mortgage on adjoining property.

Gov. Hoffman, who generally did as he was bidden by the all-powerful "boss," signed the viaduct railroad bill; but in the ensuing overthrow of the "ring," this railroad became one of the ghosts of the past.

UNDERGROUND SCHEMES.

The Tweed ring not only had power to pass any bill it chose, but also to inflict defeat upon any bill meeting its disfavor. In March, 1871, the legislature passed a bill authorizing certain persons to construct and operate an underground railroad for the transportation of passengers and property in New York city. This railroad was to extend from Bowling Green under Broadway to Fourteenth street, thence under Union square to Seventeenth street, thence under Broadway to Central park and Eighth avenue, with a branch railway from Union square under Fourth avenue and other streets to the Harlem river, and under that river to the northerly shore. The tubes used were to be of a diameter sufficient for the construction of a railway for the carrying of passengers, and two or more tracks were allowed.

Governor Hoffman lost no time in vetoing this bill, stating that Broadway for its entire length was surrendered to the company for an indefinite period, that any street or road might be opened without permission, that any man's store or other building might be taken without his consent by proceeding under the general railroad act to make compensation, and that parks for ingress and egress might be occupied virtually without compensation.[1] There was no little curiosity at the time to know why Governor Hoffman vetoed this bill and yet signed the viaduct "job." It was well known that Hoffman had aspirations to the presidency, and that the ring was scheming to place him in the White House. It was suggested that he took an independent course to strengthen himself with the people.

Another project was proposed by the Central Underground Railroad Company, which by its charter had the right of way from the Battery to Central park, excepting that part of Broadway between the City Hall and Union square. It was to run under Mulberry and other streets to Union square and Madison square, under Madison avenue to and along the Harlem River. Another branch was to run under Fourth avenue, south of Forty-second street, to Eighth street. The company's charter was to last for one hundred years. At about the same time, similar privileges embracing parts of the same route were given by the legislature to what were known as the Vanderbilt and Beach companies. Owing to the opposition of property holders and other difficulties, these roads, it is needless to say, were never built. But at that time and even later, it was expected that they would be, and the franchises had definite market values.

ORIGIN OF THE ELEVATED SYSTEM.

The present system of elevated roads dates from 1867 when the legislature passed a bill[2] empowering the West Side Patent Railway Company to build an elevated railroad on Ninth and Greenwich avenues to Yonkers, with power to establish a ferry over the East river. The bill further granted the right, consent of the rapid transit commissioners being required, to build and operate a like road along the East side of the city,

[1] *Senate Journal*, 1871, pp. 632–639.

[2] This bill was an amplification of a bill passed in 1866 granting a franchise without naming streets, to the West Side and Yonkers Patent Railway Company.

having its termini at the Battery and at New Rochelle. Finally, the bill conferred the right to erect a similar road along Broadway; this project, however, required the consent of the common council. The motive power to be used was the cable, and the company was to charge five cents for any distance less than two miles and for every additional mile or fractional part, one cent, the uniform rate to be ten cents for a period of five years from the passage of the act. Section nine distinctly stated that the company should pay to the city a sum not exceeding five per cent of its net income from passenger traffic on Manhattan island. The conditions, though fraught with so much import to the people, attracted no public attention.

It was soon seen that the cable power was not likely to prove a success, and in 1868 the rapid transit commissioners were authorized to permit the company to adopt such a form of motive power as it pleased. This act reiterated the provisions as to the five per cent payment to the city, and specified quarterly payment, the amount received to be expended on improvements in the streets on which the railroad lines were to be built.

In the same year, the company was allowed to change its name to the West Side Elevated Patented Railway Company of New York. The company was composed of promoters and speculators who had no money of their own, but whose entire business faith, possessions and stock in trade were based on the exclusive privileges given them by the legislature. That such a grant in itself was a valuable gift was demonstrated when the company secured $750,000 from George S. Coe and James H. Benedict by a mortgage upon its "property, rights and franchises." Thus solely by legislative enactment, it immediately became possessed of the most valuable kind of property upon which it was enabled to raise money enough to proceed with the building of the road.

OTHER ELEVATED COMPANIES FORMED.

Subsequently, the New York Elevated Railway Company was incorporated to build and finish the construction of the elevated railroad from the Battery to Westchester county, and thence to Putnam county. This company acquired the rights of the West Side Elevated Patented Railway Company by foreclosure sale. The legislature confirmed this sale of rights and authorized the building of the Greenwich street and Ninth avenue railroad. By

1875 the road was operated as a steam railway to Fifty-ninth street.

In the meantime—in 1872—, a charter was granted to the Gilbert Elevated Railroad Company to construct and operate an enclosed tubular road on Sixth avenue by atmospheric power. Finding this means of locomotion a failure, the company was allowed by the rapid transit commission to substitute steam, and also secured the right to build any other road than the one intended. The Sixth avenue surface railroad company opposed the scheme and secured an injunction against the building of the elevated road; later it was dissolved.

EXTENSIONS FREELY AUTHORIZED.

The series of "extensions," vastly more valuable than the original franchises and the origin of which has occasioned such protracted litigation, were granted in 1875. The rapid transit commissioners were empowered by the legislature to authorize the New York Elevated Railroad Company to build and operate its road on such streets as it chose to designate, Broadway excluded. The company aimed at precisely what every railway company has striven, schemed and bargained for, namely, to connect with the ferries and railroad depots through which the endless traffic of passengers pours. The company finally secured from the rapid transit commissioners power to build an elevated railroad on Pearl street, the Bowery and Third avenue to the Harlem river. This grant allowed the company to tap South ferry, Wall street and the Fulton Street ferry, the Thirty-fourth Street ferry by a special branch built eastward, and the Grand Central depot by another special line. The company was also allowed to build a branch on Ninety-second street so as to reach the Astoria and Harlem River ferries, a section on Chatham street (now Park Row) to reach the City Hall and the Brooklyn bridge. This comprehensive franchise, exclusive by its very nature and indefinite as to period, was given away almost gratuitously.[1]

This, however, was not all. The company obtained permission to build their westerly road from Ninth avenue and Ninety-second

[1] The conditions were that the company should complete a certain portion of the route before a certain time; that it should accept the scale of fares named by the rapid transit commission; that when its net income should amount to a sum sufficient to pay ten per cent on its capital stock, it was to run "commission trains" at reduced fares at certain hours; and that it should pay a fair proportion of the expenses of the rapid transit commission.

street to Eighth avenue, thence to the Harlem river at or near High bridge, and thence to connect with the depots of the New York, Boston and Montreal, and Port Morris railroads.

On September 7, 1875, the common council passed the resolution, and the mayor signed his approval. The consent of more than one-half in value of the property owners along the route being refused, the supreme court held that permission was given to the company according to statute. The following year the park commissioners granted the valuable franchise to occupy Battery park without compensation to the city. The board of aldermen by a vote of 17 to 3 in 1878 declared the company had acted without warrant of law in thus changing its route and called upon the department of public parks to revoke the franchise, but Mayor Ely vetoed the resolution on the ground that the park commissioners had exclusive jurisdiction.[1]

MANHATTAN ELEVATED CO. ORGANIZED.

On September 2, 1875, the New York Elevated Railroad Company made an agreement with the Gilbert Railroad Company, known afterwards as the Metropolitan Elevated Railroad, to construct the lines. In the same year the Manhattan Elevated Railroad Company was incorporated to construct and operate a steam railroad wholly within the city of New York. On May 20, 1879, a tripartite agreement was entered into between the companies, ostensibly for the purpose of avoiding the dangers of crossing railway tracks upon the same level, and otherwise securing to the people of New York the advantages of a safer and more rapid transit. Leases were made to the Manhattan Elevated Railroad Company for a term of 999 years, the latter company obligating itself to pay $10,000 rent yearly to the New York Elevated Railroad Company.

This consolidation involved one of the most notable stock inflating or "watering" operations. The Loan and Improvement Company, which constructed and equipped the Metropolitan Elevated Railroad, surrendered to the Manhattan Elevated Railroad Company its three million dollars of stock, for which $6,500,000 of Manhattan stock was issued bearing an annual guaranteed dividend of ten per cent. Another $6,500,000 of the Manhattan Company's stock, likely to yield from ten per cent to fifteen per cent, was

[1] *Proceedings of the Board of Aldermen*, CLII: 666-667.

made out of nothing. While the company was thus manipulating stock, a process subsequently continued and elaborated,[1] the grand jury, on March 28, 1879, handed down a presentment declaring the management of the elevated railroads as inefficient.

PAYMENTS TO THE CITY DISPUTED.

At that time a difference arose between the city and the Manhattan Elevated Railroad Company as to the payment of five per cent on net profits, and protracted litigation has since ensued. The city contends that no statement of the net income has ever been received.[2] The company pretends that the five per cent should be calculated on the receipts of the New York Elevated Railroad Company and not upon the lines in question operated by itself—the Manhattan Company. This amount, it claims, is equal to ten per cent on the entire capital stock originally issued by the New York Elevated Railroad Company, as provided in the lease of May 20, 1879, and to six per cent on the capital stock after the agreement of October 22, 1881. If the company is correct, it will not pay a cent to the city on the income from the great extensions, far more valuable than the original franchise, which the New York Elevated Railroad Company obtained after the legislature had granted its charter.

The Manhattan Company has paid to the city for each of the years ending October 1, 1880 and 1881, the sum of $34,210.52 in quarterly payments, and for each of the subsequent years up to 1889, the sum of $20,526.32 in quarterly payments. The city has not accepted them as *full* payment but merely on account, and the suits continue. The city demands an account of the net income since June 5, 1879, and a payment of five per cent thereon since October 1, 1879, with interest, costs and other expenses. In its answer filed in 1892, the company put in a counter-claim of $900,000 which it says it had to pay by reason of judicial decisions

[1] When in 1881 the stock of the Manhattan Elevated Railroad Company was raised from $18,000,000 to $36,000,000, there was renewed public interest in the inflation process, an interest that increased when in February, 1882, the Manhattan Elevated Railroad's employees made public their grievances. The regular agents and gatemen on the Second avenue and Ninth avenue divisions complained of having to work thirteen of the fifteen hours a day trains were operated. For this they received $2 and $1.75 a day respectively. The company reduced their working hours to twelve, but also reduced their pay 29 cents a day.

[2] *Cases, Points and Opinions*, published by Law Department of New York City, 217 : 308–9.

and proceedings to various persons for the use of the streets, and which the city ought to pay because

it [the company] has not had and employed the full and absolute right to the use and occupancy of the streets which was warranted and guaranteed to this defendant and its predecessors in title by the contract.[1]

In his opinion handed down December 21, 1891, Justice Ingraham of the supreme court says that the legislature clearly intended to bind the corporation to pay five per cent of its net income from its passenger traffic on Manhattan island; that this was a clear obligation on the part of the Manhattan Elevated Railroad Company, which succeeded to the franchise; that if the extension had been built as a part of the original railroad under its general charter, the company ought to pay the five per cent.[2] But the next year (November 17, 1892) Justice Ingraham decided: first, that the city was entitled to recover five per cent of the net income from the exercise of such franchises, rights and privileges as it obtained from the New York Elevated Railroad Company; second, that the company was not liable to pay to the city five per cent of any part of its income of that portion of the railroad on Ninth avenue from Eighty-third street to the Harlem river; third, that the company was likewise not liable to pay the city five per cent of more than one half of its net income from that portion of the railroad on Ninth avenue from Sixty-first to Eighty-third street; fourth, that the city was entitled to an accounting from the company; fifth, that the company was not liable to pay to the city more than five per cent of any of its net income received by it, and which became payable more than ten years next preceding the commencement of the action; and sixth, that the city was not liable to the company for the $900,000 it had to pay to property owners.[3] The suit is pending now before the court of appeals.

RECENT TAMMANY ATTACK.

The latest attempt upon the part of the city authorities to dictate to the Manhattan Company began early in 1899. Julien T. Davies, counsel for the Manhattan Elevated Railroad Company, publicly charged in the mayor's office, March 1, 1899, that a quarrel had arisen because the company refused to give to the Auto-Truck Company in which the Tammany leader was interested certain privileges, such as laying air pipes on its structure from which

[1] *Cases, Points and Opinions*, 217: 316–317. [2] *Ibid.*, 439. [3] *Ibid.*, 432–433.

to feed auto-trucks.[1] The Manhattan Elevated Railroad Company doubted its ability to give another company this most valuable franchise without forfeiting its charter. Another story had it that the Tammany leaders were caught "short" in the stock market on Manhattan stock.

Whatever was the real cause, the city officials began a fierce war upon the Manhattan Elevated Railroad Company. A number of ordinances were introduced in the municipal assembly, which would necessitate the expenditure of millions of dollars in carrying out the improvements called for. One forced the company to place drip pans under its structure at all street crossings. Another compelled it to operate trains on a five-minute headway during the daily twenty-four hours under penalty of one hundred dollars for each violation. By a third, the company had to inclose all stations in glass. The purport of a fourth was to stop the sale of all newspapers, magazines, gum, candies and other goods on the stations. Still another prohibited the storage of cars on the third track in the upper section of the city. More important still was an eviction notice from the park commissioners, ordering the company to remove its tracks from Battery park—a demand the city had a right to make by the terms of the original grant. The city officials justified their action on the ground that the Battery park belonged to the people, and that the company had ruined it.

It was not long, however, before the zeal of the city officials for the public welfare died away as suddenly as it sprang up. The disagreement was patched up, and the Manhattan Elevated Railroad Company is still in possession of all the privileges which the city officials threatened to take away, though it has recently been ordered repeatedly to vacate Battery park.

RAPID TRANSIT COMMISSION ESTABLISHED.

For a number of years following its construction, the elevated railroad seemed to deal satisfactorily with the question of rapid transit. The population, however, kept growing beyond these facilities. There came to be incessant complaints of the inability of both elevated and surface roads to transport the volume of passengers comfortably and quickly. A strong demand for an underground road by which passengers could be transported from the

[1] For this franchise, which he said was worth millions of dollars, Mr. Davies complained that the Auto-Truck Co. had offered to the Manhattan Elevated Railroad Company only $10,000 a year.

Battery to Harlem in fifteen minutes sprang up. In 1891, a Rapid Transit Act was passed providing for the appointment of a board of rapid transit commissioners to determine whether the public interest required the construction of a rapid transit railway, and if such were the case, to establish the route and plans of construction, obtain the necessary consents, and sell at public auction the privilege of building a road and operating it for a stated term of years. In 1892 when the franchise was offered for sale for 999 years, there was but one bidder who first offered $500 cash and half of one per cent of the receipts, and later $1,000 cash. These bids were rejected. The commission determined to abandon the underground scheme and adopt a scheme of elevated railway extension.

A revision of the Rapid Transit Act the next winter led to the appointment of a new commission, which was to submit to popular vote the question of building the railroad at public expense. Should the vote result affirmatively, the commission was to advertise for proposals and enter into a contract with the most desirable person or persons for the road's construction and operation. In case of failure in this direction, the privilege of constructing and operating the road for a certain number of years was to be sold at auction as before.

MUNICIPAL OWNERSHIP APPROVED.

An overwhelming majority of voters cast their ballots for municipal construction. However, the necessary consents of property owners could not be secured. The general term of the supreme court thereupon appointed three commissioners, who finally reported in favor of constructing the road. The appellate division of the supreme court refused to approve the report of the commissioners on the ground that they had made no inquiry of the road's probable cost.[1] The commission prepared new plans, devised so as to overcome any objections that might be raised. The new route was to embrace four tracks from the post-office to One Hundred and Fourth street. Instead of running underground on Broadway, a route that called forth the unrelenting opposition of many property holders, and that would entail heavy expenses by reason of engineering difficulties, the road was to run from the Battery to the post-office under Broadway, then by

[1] The estimates of various engineers were confusing. The rapid transit commission's engineer put the cost at less than $39,000,000, or at most not over $50,000,000. Engineers in the employ of existing roads made higher estimates.

way of Park Row, Elm street, Lafayette place, Fourth avenue, Forty-second street, Broadway, the Boulevard, and thence to Kingsbridge. There was to be a diverging branch under various streets reaching Bronx park. Part of the road in the outlying northern sections of the city, was to be on viaducts in place of the more costly tunnel. The cost of this entire stretch of twenty-two miles was not to exceed $35,000,000. In the galleries along the route, sewers, water, gas pipes and electric conduits were to be placed, thus affording revenue to the city whenever new pipes were inserted.

OPPOSITION OF VESTED INTERESTS.

The possibility of the city's securing a thorough system of rapid transit did not at all suit the existing roads. One newspaper at the instance, it was supposed, of these influences, bitterly opposed both by argument and ridicule the underground road, which it termed: "The hole in the ground," and brought an action, claiming that the act was unconstitutional. It was claimed that the act was in violation of the section of the state constitution which prohibited cities from incurring indebtedness for other than city purposes, or loaning their property and credit; that the construction of rapid transit railroads was not a city function; and that the leasing of a railroad by the city to a private corporation would be a virtual loaning of the city's credit. The court of appeals, however, in March, 1897, affirmed the constitutionality of the Rapid Transit Act, on the ground that railroads were as public in character as common highways.[1]

Though the new plan was welcomed, the requisite number of property owners' consents could not be obtained. The supreme court again appointed commissioners, and their report was wholly favorable to the project and was approved by the appellate division, with the qualification that the contractor should give a bond of $15,000,000. This unexpected requirement awoke much adverse criticism, and gave a setback to rapid transit. Prospective bidders could not or did not care to give a bond of such magnitude.

In January, 1898, Mayor Van Wyck in his first message surprised the community by attacking the rapid transit commission's plans, although the Tammany platform had expressly declared for rapid transit. His only suggestion was the improvement and ex-

[1] Sun Printing & Publishing Association vs. the Mayor, etc., of the City of New York, 152 N. Y. 257.

tension of the elevated railroads.[1] As public complaint of the inefficiency, slowness and discomfort of the elevated railroad lines had been made incessantly for years, the mayor's suggestion carried little weight. The rapid transit commission had entertained proposals from the Manhattan Elevated Railroad Company, but nothing came of them. The Metropolitan Street Railway Company also made an offer to build the rapid transit system planned by the commission provided it secured the franchise for fifty years, with the privilege of renewal for fifty years more, and the additional privileges of charging ten cents on express trains and of leasing the galleries to gas and other companies. There was such pronounced public opposition to any such arrangement that the offer was withdrawn.

CONTRACT AWARDED.

Notwithstanding the many repulses, the rapid transit commission stuck to its work. Power to issue bonds to the extent of $55,000,000 bearing not more than 3½ per cent interest, to pay for the building of the rapid transit railroad was secured. At first the city administration under Mayor Van Wyck was either hostile or indifferent, but has gradually fallen into line. The chief objection was the limitation upon the city's debt-incurring power. In August, 1899, Comptroller Coler suggested that the tunnel be built in sections. By so doing, it would not be necessary to expend more than $10,000,000 a year, and this amount could be taken from the borrowing capacity of the city without passing the limit. However, the adoption in November, 1899, by an overwhelming majority of a constitutional amendment providing for the separation of the city and county debts of Greater New York, increased the debt-incurring capacity of the city and made rapid transit a certainty. Later the court handed down a decision reducing the bond required from the tunnel contractor to $5,000,000.

On November 15, 1899, the commissioners advertised for bids and on January 16, 1900, the rapid transit commission awarded the contract to John B. McDonald on his bid of $35,000,000, he to pay interest at 3½ per cent on $30,000,000 worth of bonds (which in turn are expected to bring a premium of $5,000,000) and one per cent on the same amount into the sinking fund—a total of $1,350,000 annually for fifty-years. The city is to own the road and the rolling stock. At the end of the fifty-years'

[1] *Proceedings of the Board of Aldermen*, 1 (1898): 33–37.

lease, the city will get the railroad free of cost, the percentage that Mr. McDonald will pay more than assuring this result though the contractor has the privilege of renewal for twenty-five years more. The rapid transit commission preferred this arrangement to the other bid by Andrew Onderdonk to build the road for $39,000,000, to pay of the gross receipts above $5,000,000, five per cent between $5,000,000 and $6,000,000 and 2½ per cent additional on each million increase until 15 per cent was reached.

The road will run from the City Hall under Centre and Elm streets, Lafayette place, Fourth and Park avenues to Forty-second street, thence to Broadway, under Broadway to One Hundred and Twenty fourth street; by viaduct to One Hundred and Thirty-fourth street; under Broadway and Eleventh avenue, Elwood street, Kingsbridge road and Riverdale avenue to the Kingsbridge station of the New York and Putnam Railroad. A branch will run from One Hundred and Third street under One Hundred and Fourth street, to Lenox avenue, then to One Hundred and Forty-second street, thence easterly under the Harlem river to One Hundred and Forty-ninth street and Third avenue, by viaduct along Westchester avenue and the Boston road to Bronx park. There will be a four-track system to One Hundred and Fourth street, two tracks to be utilized for local and two for fast express trains.

The rapid transit commissioners have declared themselves in favor of building simultaneously with the tunnel a pipe gallery for the systematic placing of the multifarious pipes and wires now confusedly buried beneath the street surface. This feature alone, it is believed, would add millions of dollars to the city's resources.

TUNNELS.

Several other enterprises have been started from time to time for the construction of tunnels between New York and Brooklyn, and New York and New Jersey. The oldest project was for a tunnel from Morton street to Fifteenth street, Jersey City. It was a private enterprise begun early in the eighties. An accident in one of the caissons, which killed a number of men, and faulty construction caused a suspension of work. The plans of the New York and New Jersey Terminal Company, incorporated in 1891 to build a tunnel from the Delaware, Lackawanna and Western tunnel at Hackensack meadows to Fourteenth street

and thence to the East river, are likewise at a standstill. The surveys and the borings have been completed and the company is trying to syndicate its bonds.

In 1888, an application was made to the board of aldermen by persons representing the Long Island Railway Company for a franchise to build a tunnel under the East river to Forty-second street, thence to the Hudson River Railroad at Eleventh avenue. Including the Brooklyn branch about five miles of track were to be built. The company had obtained its charter from the legislature but could not proceed without the consent of the board of aldermen. The railroad committee demanded three per cent of the gross receipts. While under consideration, an attempt was made to extort money from the promoters, and even the vice-president of the board, Alderman Dowling, called on General Stone to ascertain "who to see with regard to it." He mentioned that sixteen aldermen—a majority—would vote with him and that he controlled their votes.[1] The Long Island Railway Company refused to take the hint and the aldermen rejected the application.

The following year the question again came before the board of aldermen, certain members of which declared they had been offered bribes, but no details were given and the character of the accusers was such as to give the charges little weight. In 1890, the company again offered three per cent of its gross receipts, or $1,000,000 in cash for the franchise, but no official action was taken.[2] Ever since that date the franchise has been pending before the city authorities, and in its present form provides for an underground route from Flatbush and Atlantic avenues, Brooklyn, to the foot of Maiden lane, New York, under this street to Broadway, and under Cortlandt street to West street. No payment to the city is offered for the privilege.[3]

The New York and Brooklyn Railroad Company was more successful, securing a franchise from the board of aldermen in 1896 to construct and operate a tunnel from Ann street and Park Row, under private property to be acquired by the company, and under Nassau, William and other streets to Pier No. 23 and thence to the City Hall, Brooklyn. The company was required to pay two and one-half per cent of its gross receipts to the city, in addi-

[1] *Report of Senate Committee on Cities*, 1890, I: p. 550 *et seq.*
[2] *Ibid.*, I:558.
[3] *Minutes of the Council*, Jan. 29, 1899, pp. 979–980.

tion to the regularly assessed taxes. Mayor Strong approved this resolution.[1]

Within the past year the anticipated success of the rapid transit tunnel, the opposition of Comptroller Coler to the building of expensive bridges across the East river, and his vigorous efforts to substitute tunnels have caused the formation of two new companies—the Manhattan and the Metropolis Tunnel companies. These corporations have applications before the municipal assembly for fifty-year franchises. The former proposes to build a tunnel beginning at Chambers street near Broadway, running westerly under the Hudson river to Jersey City. A resolution was introduced in council granting the franchise upon the sole condition that it pay to the city three per cent

or so much thereof as may be, of the net profits derived from the use of any tunnel which it shall construct, after there shall have been first retained by the company from such profits a sum equal to five per cent upon the sum expended to construct such railroad.[2]

The application was referred to the committee on railroads.

The Metropolis Tunnel Railroad Company seeks a franchise for a tunnel from Fulton and Willoughby streets, Brooklyn, under Adams street and the East river to near Oliver street, Manhattan, thence under private property to New Chambers street: thence to Broadway, the Hudson river and Jersey City. No mention of payment to the city was made in the application.[3]

BROOKLYN BRIDGE BUILT.

The idea of a bridge over East river to facilitate rapid communication between New York and Brooklyn found definite expression first in a scheme of the Tweed "ring" to plunder the city. Tweed confessed in 1877 that in 1868 or 1869 he with others secured an ordinance authorizing the comptroller to issue bonds or give the Brooklyn Bridge Company money to the amount of $1,50 ',000, for which ordinance he paid about $60,000 or $65,000. According to its provisions, New York and Brooklyn were to pay $1,500,000, and the remaining $500,000 was to come from individual subscribers; yet the latter would have entire control.[4] The assumption of complete ownership by the two cities put an end to this scheme.

[1] *Proceedings of the Board of Aldermen, approved by the Mayor*, 1896, LXIV: 152.

[2] *Minutes of the Council*, June 20, 1899, pp. 907–908.

[3] *Ibid.*, July 11, 1899, pp. 89–40.

[4] See report of the special committee of the board of aldermen appointed to investigate the "ring" frauds, etc. *Documents of the Board of Aldermen*, Part II, 1877, Document no. VIII, pp. 127–129.

Since the beginning, bonds have been issued from time to time for the construction of the bridge and approaches, of which Brooklyn's share is $21,000,804.03 and New York's $15,332,237.37. There has been paid in as surplus to the two cities approximately $3,189,000 in the proportion of two-thirds to Brooklyn and one-third to New York.[1]

BRIDGE RENTED.

Prior to 1897, the two cities operated the bridge railroad, and no other lines were permitted to cross. August 23, 1897, the bridge trustees gave the Brooklyn Elevated Railroad Company, the Kings County Elevated Railway Company and each of the Brooklyn surface railway companies permission to use the bridge, in return for which the elevated railroad companies agreed to pay twelve and one-half cents per round trip for each car, provided, that if the railroads were allowed to operate their cars by their own power, the companies were to pay five cents per round trip for each car; and the surface railroads five cents per car for each round trip. These conditions were greatly criticised, and when Commissioner of Bridges, John L. Shea, succeeded the bridge trustees in 1898 under the new charter, he repudiated the proposed contract, and exacted new and better terms. By the new contract of June 23, 1898, the Brooklyn Elevated Railroad Company assumed the running of the local trains, all responsibility for their management, and agreed to pay $250 a day for the use of the bridge tracks and for each car in excess of 2,500 per day the further sum of ten cents per round trip. When the Kings County Elevated Railroad Company began running its cars across the bridge, the Brooklyn Elevated Railroad Company was to pay two-thirds of $250 with the additional sum of ten cents for each car crossing the bridge in excess of 1,667 per day. The company further agreed to transport passengers across the bridge for three cents or two tickets for five cents; to open its books of account to the commissioner of bridges at all hours; and if the company had a surplus, to pay the city as follows: five per cent if over $10,000 and under $20,000; seven and one-half per cent if over $20,000 and under $40,000; ten per cent if over $40,000 and under $60,000; twelve and one-half per cent if between $60,000 and $80,000; fifteen per cent if between $80,000 and $100,000; twenty per cent

[1] *Report of the Commissioner of Bridges*, 1898, p. 23.

if between $100,000 and $150,000; twenty-five per cent on all amounts exceeding $150,000. This agreement also reserved to the commissioner of bridges absolute control of the bridge structure and the right to annul the contract whenever he desired.[1]

With the eighteen trolley surface lines Commissioner Shea could not make a new agreement. Thus, they are operating under the contracts of 1897.

The result of Commissioner Shea's action was to save the city thousands of dollars. Under the first contract, according to estimates of the engineers, the city would have surrendered a valuable franchise to private corporations and in addition have soon suffered an annual cash loss of $558,000.[2] Indeed, the gross profits fell from $135,587.79 in 1897 to $80,228.07 in 1898. Under the second contract, the services of 392 employees, whose salaries amounted to $402,000 a year, were dispensed with, and considering the relatively increased payments, it is undoubtedly true that the new contract annually saved the city at least half a million dollars.

The great advantage of the contract to the private companies is shown by the fact that during the latter part of 1898, 250,000 persons crossed the bridge every day as compared with 120,000 during 1897. For the year 1898, the Brooklyn Elevated Railroad Company paid the city $45,528.25 in tolls and $5,076.67 for rents of stations, tracks, etc. The "trolley" lines paid $50,726.70.

Of the various other corporations holding franchises to use the bridge for wires and cables, the New York Telephone Company paid $27,540, the Western Union Telegraph Company $1,650, the Gold and Stock Exchange $300, and others smaller sums, bringing the total amount up to $31,239.62. From real estate rents, mainly for vaults under the bridge, the city obtained $79,890.96. The entire receipts from all sources were $704,478.17, while the operating expenditures for the same period were $514,250.10.[3]

OTHER BRIDGE FRANCHISES.

The franchise for the bridge to connect Delancey street in Manhattan with Driggs avenue, Brooklyn, was granted by the legislature to the East River Bridge Company in 1883. This company exceeded the time allowed it for beginning work, and its rights

[1] *Report of the Commissioner of Bridges*, 1898, pp. 24–26.
[2] *Ibid.*, p. 27. [3] *Ibid.*, p. 34–35.

were bought on behalf of the two cities by the East River bridge commissioners, who were appointed under an Act passed in 1895. The price paid was $200,000—a payment, it was claimed, not only for the franchise but for the surveys made by the East River Bridge Company, though no actual construction work had been done. The bulk of the $200,000 was for the franchise, in effect a virtual gift of the legislature. Up to September, 1899, three and a half millions had been spent on the bridge. It is probable that the entire cost will be upwards of ten millions.

In the summer of 1899, the municipal assembly took steps to establish other bridges and voted $100,000 for preliminary surveys of the two new proposed bridges over the East river. The department of bridges in October, 1899, announced that plans for the Blackwell's Island bridge had been completed and that the work costing $14,000,000 would be begun soon. It will extend from Second avenue and Sixtieth street, Manhattan, to the foot of Charles street, Long Island City.

The lines of the proposed bridge are laid upon the general lines of a bridge, the franchise for which was obtained some years ago from the legislature, by a Dr. Ranney. It is now controlled by the Long Island Railroad Company, and the city will probably be compelled to pay a considerable sum for it. The franchise granted to Dr. Ranney expires in 1901 if the bridge is not completed, and if the officials had waited until 1901, the franchise could have been secured without expense. It is claimed by the officials that the franchise need not be purchased, but Dr. Ranney has disputed this.

The route of the other proposed bridge is from near the Bowery and Canal street to Pike slip, thence to the foot of Washington street, Brooklyn, with a terminal near Flatbush avenue and Fulton street. Its estimated cost is $15,000,000.

Two bridges to cross the North river have also been planned by private corporations, but both projects are in embryo. One is to cost $17,000,000 and extend from Weehawken, with a station on Broadway between Forty-ninth and Fifty-second streets, affording opportunity for a number of railroads to enter New York city. The route of the other bridge is from Tenth avenue and Twenty-third street to Hoboken.

CHAPTER VII.

CONDUITS AND SUBWAYS.

STEAM HEATING.

The furnishing of steam through mains and pipes for heating, cooking and motive power was regarded as in the experimental stage in 1878, but there were numerous applications for franchises. On October 14. a resolution was passed by the board of aldermen giving permission to the New York Steam Supply Company to lay, for steam and water purposes only, mains and pipes under all the city streets, chiefly upon the condition of its furnishing heat at 33⅓ per cent less than it then cost, or cost during the years 1874–5–6–7–8, to all city public buildings and for such other city purposes as might be needed. This franchise was terminable at the pleasure of the common council. Alderman Morris unsuccessfully tried to pass a resolution requiring the comptroller to sell the franchise at public auction for at least $500,000 and as much more as it would bring subject to other conditions beneficial to the city.[1] Mayor Ely vetoed the resolution, saying:

> Other privileges and franchises, which might have yielded millions of dollars have been granted gratuitously to favored individuals. I am unwilling to add to the number of privileges thus granted to the detriment of the public treasury.[2]

On December 3, the board passed the grant again with the previous conditions stricken out, but provided that the terms should be fixed by the sinking fund commissioners.[3] These officials required the company to furnish steam to the city buildings at twenty-five per cent less than to the most favored customer; to pay $150,000 in all to the city; to pay three cents per lineal foot of streetway occupied in each year in which the company's earnings exceeded ten per cent on the amount invested, and the next three per cent earned in the same year over ten per cent on the amount invested. Mayor Cooper contended in vain that the city ought to derive a much larger revenue.

On December 28, 1878, the board granted to William H.

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[1] *Proceedings of the Board of Aldermen*, CLI: 284–286.
[2] *Ibid.*, 383–384.
[3] *Ibid.*, 527.

Webb, Joseph Haight, and others permission to use the streets, avenues and public places below Chambers street, for the purpose of laying mains and pipes for the transmission of hot water, air or steam subject to conditions decided upon by the sinking fund commissioners. On January 6, 1879, Mayor Cooper vetoed this resolution, holding with the counsel to the corporation, W. C. Whitney, that the grant was invalid. The resolution was repassed by a two-thirds vote.

Late in 1879, the board granted permission to the Prall Heating and Power Company, to lay mains and pipes in the streets avenues and public places for the furnishing of hot water and steam. The chief conditions were a bond of $50,000 to replace the pavements after their disturbance; a payment of three cents for every lineal foot until the sum of $200,000 was reached; and another payment of three per cent when the net profits of the company should exceed ten per cent, if that amount were received beyond the ten per cent. Mayor Cooper, on January 3, 1880, vetoed this resolution also, on the ground that he did not believe in having the streets broken up, except under strict control; that the city ought to receive a reasonable compensation for the grant.[1] On August 10, 1880, the board passed another resolution, which was approved by Mayor Cooper, giving the franchise on condition that it pay the city the entire cost of replacing any street; that it pay the city three per cent of its gross receipts and twenty cents for each lineal foot of street occupied and that it furnish all city public buildings with hot water and steam.[2]

Not to be dismayed by the opposition of the mayor, the board of aldermen on February 17, 1880, gave to the United States Heating and Power Company the right to lay pipes in the streets and heat buildings, the main condition being that the company pay two per cent of its profits every year when the profits exceeded ten per cent. Only three members voted in the negative.[3] Again Mayor Cooper vetoed the resolution, because the welfare of the city was not duly protected, the terms vague, the conditions ineffective, there being no limitation upon the nominal capital of the company.[4] But again the board passed the resolution over the mayor's veto by a vote of fifteen to three. "Any friend of the

[1] *Proceedings of the Board of Aldermen*, CLVII: 27.
[2] *Ibid.*, CLIX: 88–89. [3] *Ibid.*, 390–397. [4] *Ibid.*, CLVII: 521–2.

working man," said Alderman Shiels, who in later years was indicted for bribery, "would be in favor of such a measure."

Having demonstrated its ability to pass with the greatest ease such grants over the mayor's veto, the board of aldermen, in June, 1880, passed the resolution granting a second franchise to the Prall Company by a vote of twelve to eight. The conditions were practically the same as those fixed by the sinking fund commissioners for the former grant.[1]

So complaisant had this board proved itself that the New York Steam Company had little difficulty in arranging another grant. On November 16, 1880, the aldermen gave the right to lay mains and pipes in all the streets for the supplying of motive power for heating, cooking and "other useful applications." The company was required to pay three cents per lineal foot to the city until the amount reached $100,000.[2] Mayor Cooper vetoed this resolution.[3] But the ordinance was repassed by a two-thirds vote.

The New York Steam Company is now the only one of its kind operating in New York city. According to the rate of payment since 1881, it will take the city several centuries to reach the maximum figure of $100,000 per year. From October, 1881, to September 30, 1899, this company paid to the city $1,845.48,[4] or an average of about $100 per year.

ELECTRIC LIGHTING FRANCHISES.

The first electric lighting franchise was granted to the Edison Electric Illuminating Company on March 22, 1881, authorizing it to lay wires, tubes and conductors for supplying electricity in all the city streets. The conditions were that whenever a permit should be granted to open the streets a sum equal to one cent per lineal foot of the streets occupied should be paid to the city, and that all excavations should be under the direction of the commissioner of public works. Mayor Grace vetoed the resolution for the reason that one cent per lineal foot was no adequate compensation for the valuable franchise granted. But on April 10, by a vote of ten to two, the board passed the resolution over the mayor's veto.[5]

Two days later, the aldermen empowered the Brush Electrical

[1] *Proceedings of the Board of Aldermen*, CLVIII: 890.
[2] *Ibid.*, CLX: 490. [3] *Ibid.*, 852–857
[4] Statement of the Bureau of City Revenue.
[5] *Proceedings of the Board of Aldermen*, CLXII: 40–42.

Illuminating Company to use the streets for electrical purposes on somewhat the same conditions. Mayor Grace vetoed this resolution for the reasons given above.[1] On May 3, 1881, the board repassed the resolution by a vote of nineteen to two.[2]

At the same time, the board of aldermen granted a franchise to the United States Illuminating Company simply requiring the payment of one per cent per lineal foot of streets opened. Mayor Grace likewise vetoed this resolution, and with the same result, viz., that on May 3, the measure was made a law by a vote of nineteen to two.[3]

For two years the aldermen rested from their labors, but on March 13, 1883, aroused sufficiently to pass a resolution permitting the New York Electric Lines Company to lay wires or other conductors of electricity in the streets. Rumors of the promise of money and stock to the aldermen were general, but there was no specific proof of bribery. The methods used in attempting to pass the ordinance were such as to make the charges easily believed. The report of the committee on ferries and franchises was read so hastily that nobody except those in the secret knew what it contained. Not even the names of the men back of the company were known. The alleged capital stock was $5,000,000. The company was to pay to the city two per cent of its gross receipts. Mayor Edson sent in his veto, stating that the company existed only on paper and that the power to tear up the streets ought not to be given to a company of unknown responsibility. The mayor's remarks made no impression and the resolution was passed over the veto April 10. This company, however, never operated for reasons given below.

COMPANIES MULTIPLY.

For several years, the Edison, Brush and United States Electric Light Companies had a practical monopoly. In 1887, six companies applied to the board of aldermen for franchises—the Waterhouse Electric and Manufacturing Company, the American Electrical Company, the Ball Electrical Company, the Mount Morris Electric Light Company, the Harlem Lighting Company and the Northern New York Lighting Company. The matter was referred to the law committee and there remained for some time.

[1] *Proceedings of the Board of Aldermen*, CLXII: 202–208.
[2] *Ibid.*, 856. [3] *Ibid.*, 204–205.

While these franchises were being considered, a resolution was introduced giving a franchise to the East River Electric Light Company. According to Alfred R. Conkling, a member,

> It was rushed through the board despite the protest of the minority; we knew nothing about it; and we asked to have it laid over for five days so that we could have time to examine the matter; but the franchise of the East River Company was rushed through.[1]

The company was allowed to string its wires over and under the streets, the idea being to arouse competition with the Brush and United States electric "combination." The compensation to the city was one arc light for every fifty furnished to private consumers and one cent per lineal foot of the streets occupied.[2] The fact was established by the testimony of Mr. Conkling that the alderman most active in passing the franchise was a stockholder in the company and boasted that he controlled the board of aldermen.[3] After the East River Company obtained its franchise, it offered to furnish electric light for fifty cents per lamp, the rate before that being seventy cents.

The "combine," as Mr. Conkling termed it, seemed determined to prevent the six companies from securing franchises until certain arrangements had been made. The newspapers raised the cry of "boodle," and the "bosses" of the ruling political factions became alarmed and ordered their henchmen to explain. Finally, on May 31, the board granted permission by a vote of 22 to 2 to the six companies to erect and locate poles and hang wires. As compensation to the city, the companies were subject to the same conditions as imposed upon the East River company.[4] The result of the admission of these companies was that prices were reduced to twenty-five cents a night per lamp. Neither the Waterhouse, American nor Ball Companies now operate, but their franchises are said to be still good. The Safety Electric Light and Power Company obtained a franchise in 1887, and the Electric Power Company in 1888.

RECENT OPERATIONS.

With the establishment and organization of the board of electrical control, the power of granting franchises was vested in that body. The United Electric Light and Power Company ob-

[1] *Report of Senate Committee on Cities*, 1890, I: 476.

[2] *Proceedings of the Board of Aldermen*, CLXXXV: 775–777.

[3] *Report of Senate Committee on Cities*, 1890, I: 478.

[4] *Proceedings of the Board of Aldermen*, CLXXXVI: 649.

tained a franchise in 1889. The Block Lighting and Power Company No. 1, which was succeeded by the Manhattan Lighting Company, secured its franchise in 1894; the Fleischhauer Electric Light and Power Company and the West Side Electric Company, which have no plants and do no business, in 1896; the Madison Square Light Company in 1894, but with the East River Electric Light Company was succeeded by the Manhattan Electric Light Company in 1896.

As the Greater New York charter, which prevents franchises from being given for more than twenty-five years, was to go into effect January 1, 1898, there was a rush to secure franchises in perpetuity before that date. On the very last day of the existence of the board of electrical control, December 31, 1897, a number of franchises of the greatest importance were passed at lightning speed. To the Greater New York Electric Light and Power Company was given a perpetual franchise authorizing it to lay wires and other conductors in every street, avenue and public place in the city, provided that this privilege was exercised only in and through the subways of the Consolidated Telegraph and Electrical Company.[1] No provision whatever was made for compensation to the city. On the same conditions, perpetual franchises were given to the Pelham Electric Light and Power Company, the Commercial Light, Heat and Power Company and the Colonial Electric Company.[2] Of these companies, only the Pelham Electric Light and Power Company operates.

At present all the operating electric light companies, excepting the United Electric Light and Power Company and the companies it controls—the Brush and the Ball Electrical Illuminating Companies—, are controlled by the New York Gas, Electric Light, Heat and Power Company. This company was incorporated in October, 1898, by the same capitalists, it is said, who control the Metropolitan Street Railway Company. Its present capital is $36,000,000.

Since the completion of the subways none of the electric light companies has paid anything whatever to the city for their franchises. According to a statement made by Commissioner Kearney before the board of estimate and apportionment, the various electric

[1] Minutes of Meeting, Dec. 31, 1897, of the Board of Electrical Control, Including Annual Report for 1897, p. 1.

[2] Minutes of Meeting, Dec. 31, 1897, etc., pp. 2–3.

light companies have divided up the city territory, and thus extinguished competition.

TELEGRAPH AND TELEPHONE GRANTS.

Franchises conveying the right to string telegraph wires along streets were not thought, in the years following the introduction of the Morse system, as sources of revenue to the city. The customary proceeding, as in the case of the New York State Telegraph Company and the New York and Lake Erie Company, organized early in the fifties, was to give permission to use any avenue or street that the street commissioner might advise.[1] Thus the telegraph companies obtained the privilege of cumbering the streets with poles and wires for the mere asking, though some offered to pay $10 for every pole. Even as late as 1881, after Mayor Cooper had vetoed a number of measures because of inadequate compensation to the city, the board of aldermen, on December 21, of that year, gave to the Law Telegraph Company the right

to use the streets within the city of New York for the purpose of constructing and laying lines of electrical conductors underground from time to time upon, above or below the surface of the ground, boxes, vaults or other fixtures suitable for distribution and testing from time to time the wires and insulators of said lines, and for access thereto.

Mayor Edson followed the example of his predecessors and vetoed grants containing no provisions beneficial to the city. And finally on May 2, 1883, the board of aldermen required the Western Union Telegraph Company for the right to lay wires, pneumatic tubes and other necessary fixtures over and under the city streets, to pay to the city one cent per lineal foot of street opened and to give to each of the police and fire departments the free use of one wire. Aldermen O'Connor, Grant and Wells, who had opposed every other attempt to give away franchises, strongly but vainly protested.

The board of aldermen of 1884, which for corruption has never been excelled, granted to the Commercial Cable Company sweeping privileges for the stringing and laying of electric wires, without restrictions. Mayor Edson vetoed this ordinance on August, 18,[2] but the aldermen passed it over his veto.

If the various companies enjoying the privilege of stringing wires and planting poles in streets ever paid anything to the city, there is no available record of the fact. And certainly since

[1] *Proceedings of the Board of Aldermen*, XLI: 249 and 346.

[2] *Ibid.*, CLXXV: 427–429.

the introduction of subways, none of those mentioned nor any other company operating wires, such as the American District Telegraph Company, the Postal Telegraph Company, the Gold and Stock Telegraph Company, the Holmes Electric Telegraph Company, the Stock Quotation Telegraph Company, the Manhattan Fire Alarm Company, the Automatic Fire Alarm and Extinguisher Company, has paid anything to the city for its franchise.

Chief among the franchises granted by the board of aldermen in 1881 and 1882 was that given to the Metropolitan Telephone and Telegraph Company. Its provisions were so sweeping and the compensation to the city—one cent per foot of street used—so paltry, that strong criticism was aroused. On November 29, Mayor Grace sent in a veto, the chief objection being inadequate compensation.[1] The aldermen waited a fortnight, and then, on December 14, 1881, passed the grant over the mayor's veto. When the New York Telephone Company was organized in 1896, it took over all rights and franchises of the Metropolitan Company. Like the telegraph and electric light companies, it has paid nothing to the city for its franchise.[2]

ELECTRIC SUBWAYS.

When in 1886, the first subways were ordered to be constructed under the law constituting the board of electrical subways and compelling the companies whose wires were put underground to pay the commission's expense and the construction of the subway, there was a fierce competition on the part of various companies. The board of electrical control finally gave the franchise to the Consolidated Electrical and Telegraph Subway Company, thus, as was remarked, "conferring on a corporation practically of its own creation such exclusive privileges as the legislature itself is prohibited from conferring by constitutional prohibition." The conditions of the franchise provided that all over ten per cent of the net earnings was to be paid to the city.

This franchise constituted such a great monopoly that the most persistent efforts were made to overthrow the action of the board of electrical control. The New York Underground Telegraph Company, which owned the local rights and patents of the North American Underground Telegraph and Electrical Company, claiming that they held a permit to open the streets upon payment of

[1] *Proceedings of the Board of Aldermen*, CLXIV: 784–8.

[2] Statement of the Bureau of City Revenue.

one cent a lineal foot granted by Hubert O. Thompson when commissioner of public works in 1883, tried to open the streets, but one of the officials was arrested. The New York Electric Lines Company applied in vain for a permit to open the streets, and then sought to enjoin the subway commissioners but was defeated. The Western Union Telegraph Company resisted the official declaration that it must place its wires in the conduits of the Consolidated Telegraph and Electrical Subway Company and declared that the bill creating the commission distinctly prohibited the granting of any exclusive franchises. The dispute was settled finally by the Western Union Telegraph Company and the Metropolitan Telephone Company securing control of the Consolidated Telegraph and Electrical Subway Company. The American Bell Telephone Company through its local representative, the New York Telephone Company, owned sixty per cent and the Western Union Telegraph Company forty per cent of the stock of the Metropolitan Telephone and Telegraph Co. The latter and the Western Union Telegraph Company agreed to bear the expense of the conduits and receive the bonds of the construction company in return.

CITY DEPRIVED OF REVENUE.

With the completion of the subways every company using electrical wires had to place them in the conduits of the Consolidated Telegraph and Electrical Subway Company. All payments these companies were to make to the city for the stringing or laying of wires totally ceased, and all were forced to pay tribute to this company, which, in turn, as will be shown, has paid absolutely nothing to the city for the enormously valuable privileges it enjoys. Yet, at a meeting of the board of electrical control on December 10, 1890, in Mayor Grant's office, a resolution was passed that thereafter the rate to be paid the company for trunk line ducts was to be as follows: 3-inch duct, $900 per mile per annum; 2½-inch duct, $800; 2-inch duct, $700. This resolution still holds.

When it was found that it was dangerous to operate high and low tension wires in the same conduits, the Empire Subway Company was organized on May 15, 1891, as an offshoot to the parent company, to use the low tension system. The electric light companies operating the high tension circuits continued using the conduits of the Consolidated Telegraph and Electrical Subway Company, while the low tension electric and other companies

transferred their wires to the Empire conduits. At this time a new agreement was made with the commissioners of subways by which the company could increase its capital stock at any time.

Here was a monopoly of the largest proportions, created by a few men meeting in secret. No one knows, except those immediately interested, what profits have been made. According to the latest available report of the department of buildings, lighting and supplies, there were operated in the Boroughs of Manhattan and the Bronx 74,883.34 miles of electrical conductors in subways, divided as follows:

For telephone and telegraph service	71,851.65	miles.
" electric light and power service	981.24	"
" Edison lighting service	390.	"
" fire department service	923.	"

The figures include the power ducts used by the street railway companies, but they give an idea of the huge business done by the subway companies. The nominal profits have never risen above 6.28 per cent,[1] although believed to be much greater in reality; hence the city's prospective payment of all over ten per cent is as remote as ever.

As a result of the practical monopoly held by the Metropolitan Telephone and Telegraph Company, it suddenly raised its rates for unlimited service from $125 and $150 a years to $240 a year, and all New York city had to pay them or do without telephone service. In some years the net profits rose to 145 per cent on the actual cash capital, excluding from computation the capital added by dividends not distributed.[2]

STREET RAILWAYS LAY CONDUITS.

Quite recently, the companies using electrical subways have found a means of relief from the monopoly in the newly-laid Metropolitan conduits. The framers of the new charter thought they had put it beyond the power of any company to secure a franchise in perpetuity, and had prevented a repetition of past abuses by providing stringent regulations, by balancing one official body against another, by calling for full returns to the city, and by preventing secrecy and haste. But the commission's efforts have not been as effective as desired, as shown by the laying of the Metropolitan Street Railway's conduits.

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[1] Statement of the Bureau of City Revenue.

[2] Argument of Simon Sterne before the Senate Committee on Cities, February 5 and 19, 1895, p. 6.

The Metropolitan Street Railway Company had tried with unusual success underground electricity on some of its routes, and was anxious to equip all its lines. Obtaining the necessary official permission, work was started on the Broadway subway in the fall of 1898. The large number of ducts aroused public discussion.[1] No one believed that the company needed all of them for its electric power. When in 1898, the New York Gas and Electric Light, Heat and Power Company was incorporated, not a few observers linked it at once with the extremely large number of ducts being laid by the Metropolitan Street Railway Company. And despite official denials, it was found that the capitalists in the Metropolitan company held a controlling interest in the New York company.

Although the city authorities took no action, some of the interests affected began suit in the supreme court on June 29, 1899, in the name of Wm. H. Rieger, against the Metropolitan Street Railway Company, the commissioner of highways and the commissioner of buildings, lighting and supplies to prevent the Metropolitan company from using electricity for any purpose other than that of operating its cars. Colonel James, chief of plaintiff's counsel, stated:

> The plaintiff in this action believes that by action of the defendant great loss will accrue to the city, and incidentally to himself and every taxpayer. We are reliably informed that responsible parties are willing to form a corporation which will pay the city $500,000 a year for the very privileges which the Metroplitan Street Railway Company is usurping, or preparing to usurp for nothing.[2]

Lately it is rumored that some of the conduits are to be used by the People's Telephone corporation, a consolidation of the American Telephone, Telegraph and Cable Company and the Knickerbocker Telephone Company. For a considerable time this company, which was organized to fight the existing telephone monopoly, could not obtain a permit to lay wires in the city subways from the commissioner of public buildings, lighting and supplies. Suddenly in November, 1899, this official approved the applications. As the company is partly controlled by the principal

[1] It is alleged that on the Fourth avenue line alone, the Metropolitan Street Railway Company has laid eighty-five pipes or ducts for the transmission of electricity, when not more than twenty could possibly be used to run the cars from one end of the line to the other on half a minute headway. Thirty-six conduits have been laid alongside its tracks in upper First avenue, though only four are to be used in operating and lighting cars. The Third Avenue Company has followed a similar plan.

[2] One newspaper valued this franchise at $100,000,000.

owners of the Metropolitan Street Railway Company, it will very likely use the latter's conduits.

The new telephone company has a capital stock of $60,000,000. It promises full telephone service for $100 a year, and limited service for $30 as against the existing monopoly's charge of $90.

The Tubular Dispatch Company—the only one operating a system of pneumatic tubes in New York city—is working under an old charter obtained from the legislature in 1874. Nothing was done until 1897 when arrangements were made with the Federal authorities to transmit mail matter between certain stations. In order to lay tubes, the consent of General Collis, commissioner of public works, had to be obtained, and he stipulated that the company pay to the city one per cent the first year, one and one-half per cent the next year and two per cent on its gross receipts for the balance of the time its franchise was used. At present the company has 4.3 miles of double tube used exclusively to transmit mail matter. There is a line between the Produce Exchange, the General Post Office, Madison Square to Station X and Forty-second street. By this system a package of 300 or 400 letters can be sent from the General Post Office to Madison Square in three or four minutes. This company controls the New York Mail and Transportation Company which operates a pneumatic tube system across the Brooklyn Bridge and which pays $1,000 a year for the franchise. For the use of the tubes the government pays a specific rent—$148,500 a year to the Tubular Dispatch Company and $14,000 to the Brooklyn line. Up to February 1, 1899, the Tubular Dispatch Company paid to the city $928 as the percentage on its franchise.[1]

The Manhattan Refrigerating Company is a concern that supplies cold air to the West Washington Market for refrigerating purposes by means of underground pipes. According to its agreement with the comptroller on May 23, 1898, it pays five per cent of its gross receipts to the city. From October, 1898, to October, 1899, it paid $415.[2]

[1] Statement of the Bureau of City Revenue. [2] *Ibid.*

CHAPTER VIII.

A CENTURY OF FRANCHISE HISTORY.

By Milo Roy Maltbie.

Whatever may be our opinion of public control, ownership or operation of public franchises, the preceding chapters throw considerable light upon certain phases of the problem and establish certain facts which it may be well to emphasize.

THE TREND OF THE CENTURY.

Municipalization is not a new fad. In colonial times and even in the early part of the present century, the wisdom of this policy was unquestioned. The communal spirit, a prominent factor in European municipal economy, emigrated with the sturdy burghers to the new world. There it grew in strength, for New Amsterdam was a commercial and an industrial, as well as a political entity, and business came naturally to be associated with politics, owing to this two-fold character of the town. Thus not only ferries, wharves, markets and water works were municipal enterprises, but the borough authorities owned considerable land, and received rents from rivers, creeks, fishing and hunting rights. For that day, this sphere of activity was very broad and comprehensive; it embraced a very large portion of the town's commercial and industrial life.

During the last one hundred years, many functions have been lopped off. The present municipality owns comparatively little real estate that is not used directly for governmental purposes. The receipts from fishing and hunting rights are no longer a factor in municipal finance. The markets play no such important part in the present economy as they did in colonial times, when the borough practically had a monopoly. Further, the wonderful development and increasing complexity of industrial life have added little to what may be termed the industrial functions. To be sure, docks, ferries and water works are still owned by the city, and an

infinitely larger revenue is derived therefrom than a century ago. But pass in review every line of activity; contrast what the city is now doing with what it did a century ago; consider the many avenues of industry in which the city has not passed the stage of public control. The conclusion is inevitable that municipal activity has wonderfully increased in *absolute* amount, but declined *relatively*. While the city has been adding a few entirely new functions and extending others, the individual has multiplied, diversified his activity many fold. And certainly the communal spirit is not as strong as a century ago, although within the last decade, it has grown rapidly. If, therefore, we adopt municipalization in this or that line, we are not blazing a new path through a trackless forest, but simply reopening a roadway which for some decades has been little used.

It is owing to this decline of the communal spirit that the franchise question became so important. If the policy which dominated municipal economy in colonial times had not been departed from, franchises for street railways, lighting systems—gas and electric—, conduits and subways of various kinds would have been retained by the city, and very few grants would ever have come up for settlement.

WHAT AUTHORITY SHOULD GRANT FRANCHISES?

The granting of franchises was considered at the very first a local function, to be exercised by the council. The mayor was given later the veto power, which might be overridden by a bare majority or a two-thirds vote. This practice was followed until about the middle of the century, when it became unendurable. The councilmen, at first fairly honest although inefficient and careless of the public interests, grew to be corrupt, asking and receiving bribes for their votes. The welfare of the community was utterly disregarded in the scramble for personal aggrandizement and wealth. General distrust of the local authorities and appeals to the state legislature for relief resulted. An act was passed transferring the power to lease ferries to the commissioner of the sinking fund (p. 79). This gave so much general satisfaction that no change has since been made, except to confer the power upon the board of estimate and apportionment, which now grants all ferry franchises.

In the case of street railway franchises, the legislature went

still further. The same grand jury that investigated and made known the disgusting corruption connected with the granting of ferry franchises, showed the same to be true of street railway grants. Public anger soon reached a white heat, for while ferry franchises would be resold in a few years, railroad grants were in perpetuity and the injury was largely irreparable. Appeal was made to the legislature for relief, and in 1854 an act was passed making it necessary to secure the consent of a majority of the property-owners upon the street where a road was to be constructed (p. 118). The remedy was not effective. The council continued to grant franchises irrespective of the interests of the community.

In 1860, the governor suggested that the council be deprived of all power as to grants, and the citizens of New York were so eager to catch at the merest straw that hardly a voice was raised in protest against this invasion of home rule. The legislature had power to grant franchises and had exercised it to some extent for several years with not very satisfactory results, which fact should have warned New Yorkers that little improvement need be expected. But evils that they knew not of seemed less dangerous than those then present. The bill became a law and the railroad promoters and lobbyists transferred their headquarters to Albany (p. 122). Conditions soon became worse than ever. The legislature proved to be as corrupt, if not more, and even less considerate of the interests of the city than the council.

Then the constitutional convention of 1874 tried its hand and limited the power of the legislature, requiring the consent of the local authorities as well as the property-owners (p. 134). This prevented the passage of almost all franchises. But power was restored to the council in 1884 (p. 139). Still no positive relief, even though aldermen were tried and convicted. Then came the Cantor Act of 1886, requiring the sale of street railway franchises at auction, the minimum compensation being three per cent of gross receipts for the first five years and five per cent thereafter (p. 149). This law was evaded in many ways so that the council still had considerable power, but it improved matters somewhat.

The present charter empowers the municipal assembly to grant franchises, but requires that the ordinance be referred to the board of estimate and apportionment, whose approval must be secured. Even then a three-fourths vote of all members of each house is

necessary, and if the mayor vetoes the grant, five-sixths must vote to pass it over his veto. Thus the board of estimate and apportionment has great negative influence, as also does a small minority in one chamber. The object evidently was to restrict the power of local authorities rather than extend it. The aim was negative rather than positive good.[1]

Similar experience was had in the case of other franchises. The legislature never took from the council its power to grant gas franchises, but it regulated the price and in other ways indirectly curtailed its authority. In the case of franchises to lay electric conduits and other subways, the council has also lost much of its prestige, principally by transfer of authority to other local bodies, as in establishment of the board of electrical control in 1887 (p. 189), and the rapid transit commission in 1875 (p. 168) and 1891 (p. 173).[2]

The conclusion from experience is that the municipal council is incompetent, that the legislature is equally incompetent, and that legislative bodies in general are not the proper authorities to grant franchises. It is to be noted, however, that the mayor and governor have almost invariably shown a greater appreciation of the public welfare than the council and the legislature. The best authority is one composed of high administrative officials.

METHODS OF GRANTING FRANCHISES.

The experience of New York city also leads to rather definite conclusions as to methods of granting franchises. In every instance, the plan first adopted was entire freedom of council. Usually an application was made by a corporation or individuals for a certain franchise, which sometimes contained an offer of compensation and occasionally specified other conditions. This application was then referred to a committee, reported upon and passed or laid aside as the council chose. Rarely, if ever, were other offers invited or the best terms that could have been secured accepted. The whole question came to be settled finally by the amount of money or political influence that could be brought to bear, and the ring or company that had the largest wallet or

[1] These provisions of the Greater New York charter apply to all franchises, not merely to street railways.

[2] Since the above was written the power of the rapid transit commission has been increased to embrace Greater New York, thus depriving the municipal assembly of all power over underground railroads.

"pull" secured the grant. An ordinance was hurried through secretly or interred in committee as seemed best, there being practically no regulations providing for publicity, careful consideration and fair treatment. The results were most disastrous to public interests.

First, in the case of ferries and wharves, and afterwards in the case of street railways, the plan of disposing of franchises at auction sale was tried, a minimum price being fixed, below which no offer would be accepted. In the case of ferries, this has worked very successfully, and moderately so in the case of street railways. The auction plan has certain advantages which make it well adapted to some franchises and certain disadvantages which make it poorly adapted to others. In the first place, the values of ferry rights have become well known, and the board of estimate and apportionment can quite accurately determine, therefore, what ought to be the "upset price." By so doing, it frustrates any combination to defraud the city by means of an agreement not to bid more than a nominal sum. The operation of ferries, further, calls for a comparatively inexpensive plant. One needs simply to own, equip and operate boats, which are easily disposed of, being marketable commodities. The advantages of combination are not very great. There are always a number of purchasers ready to bid, if the price is low; and with the exception of business ability most of them are nearly upon an equality. To such conditions, the granting of franchises by auction sale is very well suited.

Street railways are quite different. The value of a franchise depends very largely upon the connections the line makes with other lines. A franchise for a suburban line is of little value to a company which does not have access to the heart of the city, and its operation as a purely independent line may mean an actual loss. But when run as a feeder, landing passengers in the business districts, its operation becomes more profitable and may even turn a deficit into a considerable surplus. Such conditions which exist to a greater or less degree, no matter where the prospective line may be located, limit very greatly the number of bidders and usually give one a large advantage over all the others. Thus when a franchise is put up for auction, the city is able to secure little more than the second best bidder is willing to give, unless the rivalry is so keen that the bids pass all reasonable bounds,

as has been the case in a few instances (p. 155). Then a company may bid an exorbitant price merely for the purpose of shutting out a rival, perhaps intending not to construct the road until traffic has so increased as to make its operation profitable even under the exacting conditions. When competition has been eliminated by consolidation until there is practically only one corporation, as is now the case in the boroughs of Manhattan and the Bronx, the sale of franchises to the highest bidder becomes a farce. The city is then forced to make the best terms possible with the single company, and unless considerable power of control has been reserved, the public is at the mercy of the corporation and must depend upon its good nature for fair treatment

These conditions are due, further, not to temporary or local causes but to the nature of the enterprise. A considerable plant and equipment is required which cannot be easily disposed of, transferred to other localities or put to other uses. The advantages of consolidation, of operation of many miles of road under one system are many and important. The cost of production decreases as the size of the system increases. The passenger finds fares cheaper, transfers more general and passage less frequently broken.

Another reason why disposal of franchises by auction has not and can not be applied to some franchises, is that they are not exclusive. Wharf and ferry franchises, for example, convey to the owners the exclusive right to use the wharves; and as the supply of such rights is very limited, the franchises become very valuable. The same is largely true of street railways, but other considerations limit the success of sale to the highest bidder, as just seen. But in the case of gas works and mains, electric lighting, steam heating, telegraph, telephone and various other conduits, the laying of one does not exclude by nature the laying of several others in the same street. If, however, the grant should be made exclusive, so that no other company of a like character could be given the right to lay mains in a given street, then the franchise might be auctioned off with some degree of success, especially if the grant were perpetual. But not until and only when, either by nature or law, the right becomes exclusive to such a degree as to make it of considerable value, will disposal of franchises by auction be more advantageous than an agreement

arranged by private corporations and honest, efficient public officials.

It is undoubtedly in recognition of these principles that the Greater New York charter did not require sale to the highest bidder in every case, but left the matter to the local authorities, imposing many restrictions as to methods of procedure in order to prevent haste, and to secure publicity, careful consideration and wise action. The wisdom of these provisions has never been questioned.

FRANCHISES SECURED BY BRIBERY.

The criticism of the systems thus far tried are not due so much to faults of the system as to the dishonesty and inefficiency of the officials who executed the law. It would have been an easy matter to have conserved public welfare, if only conscientious men of ability had been elected. The preceding pages reek with instance upon instance of corruption and robbery of the city, but the half has not been told. If only the evidence had been presented which is to be found in court records and proceedings of legislative investigations, to say nothing of well-substantiated reports and the vast Augean stables closed to public eyes, the reader would rebel and throw aside the nauseating narrative. Indeed, one is almost convinced that hardly a single franchise in New York city, with the exception possibly of many wharf and ferry privileges, has been granted without corrupt means. This leads one to ponder well whether the claim may not be true, which is made by ardent supporters of municipalization, that private control of franchises almost surely leads to corruption, and that with all our official corruption and dishonesty, conditions would not have been and would not be as bad, if municipal ownership were adopted, as under private ownership.

The question has an economic as well as a moral aspect. Whatever sums of money were spent in bribing aldermen and in granting franchises by other dishonest means, sooner or later were paid by the citizens. They were either capitalized or paid out of earnings, and in either case prices were fixed at a point which produced a satisfactory profit, after deducting money invested in persuading the representatives of the people to give away their birthright. Every citizen has been paying the cost, not only through loss of revenue to the city from valuable privileges given

away, but through payments to the city officials for giving away the very rights the citizens wished preserved.

COMPENSATION TO CITY INADEQUATE.

After reading the preceding chapters, who can deny that with the exception of wharves and ferries, the city does not receive an adequate return for the rights it has conferred upon private corporations? Note the many instances in which far better offers were made than finally accepted, the companies formed to speculate in franchises, and the large bribes offered. Contrast the receipts from enterprises which are run by the city—docks, ferries, waterworks—with those from franchises in private hands. Mark the dividends that are annually distributed by the various corporations, and remember that whereas the returns upon the capital actually invested are never less than the nominal dividends, they may be much larger owing to the great amount of watered stock. Study the instances in which franchises have been parted with for nothing and then, being wanted by the city, have been bought back only after paying a considerable sum. Compare the capitalized value of the payments made to the city with the value of the franchises as just assessed by the state board of tax commissioners. Take the street railroads which pay more than other undertakings, except wharves and ferries. During 1899, the city received $318,938.44 (p. 163) not including taxes. Suppose this were capitalized; on a three per cent basis, its value would be only $10,600,000; on a one per cent basis, $32,000,000. But the state board has estimated the franchise value at over $135,000,000, and if the board has erred in any direction, it has placed the value much too low, certainly considerably below the market value.

Just recently, when the Third Avenue Railroad Company was on the verge of bankruptcy, a prominent official called attention to the fact that an extremely valuable franchise was owned by the company and that it would become more valuable without any effort upon its part, simply by the increase in population along the route. Yet prior to the enactment of the Ford Bill for the taxation of franchises, the Third Avenue Company paid taxes on only $2,174,750, and the compensation to the city for this valuable franchise was not one penny in 1899, the company resisting payment of the small license of $20 per car per annum (p. 162 and note on p. 159). The state board values the franchise at over $19,000,000.

The compensation received by the city has always been very small. When the first franchises were granted, very few thought them the source of great wealth, and practically no compensation was exacted. A few far-sighted persons endeavored to persuade the council not to sell its birthright for a mess of pottage. What may be pardoned as ignorance and stupidity at first, came to be criminal negligence and downright robbery. The mayor repeatedly vetoed grants on the ground that franchises could be sold for large sums. A few members of the council time and time again voiced this fact, and offers of large compensation were frequently made by reponsible persons. The aldermen turned a deaf ear.

Further, the grants were so drawn as to permit evasion, and provisions that seemed to protect public interests proved to be worthless. Witness the history of gas franchises, the fact that only two companies have paid anything to the city, and one since 1884 a paltry sum of less than $15,000 per year (pp. 96, 97, 104). Witness also the evasion in the case of electric conduits and subways (p. 190). Even street railways, which alone of all franchises, except docks and ferries, pay any considerable sum, really contribute very little compared with the value of the privilege granted and the intent of the grantors (p. 170). This points decidedly to one conclusion, viz., that franchises should be drawn not by the attorneys of the corporations, but by the city officials, who though harmless as doves should be wiser than serpents.

FORM OF COMPENSATION.

As to the basis of compensation, New York's experience also points to certain conclusions. In most instances, payments have been in the form of percentages on gross receipts (pp. 104, 162, 163, 170, 177, 193), which are economically unsound, but which have proved to be much more practicable than a percentage of net proceeds, as evasion is easy.[1] Car licenses have been tried and made to produce considerable revenue (pp. 162, 163, 179); but when the charge is high, there is a temptation to use as few cars as possible, thus impairing the service. In some instances, a fixed charge per foot of mains or conduits has been adopted (pp. 99, 182, 185, 190), and might have been made to produce considerable revenue if the charge had not been insignificant. Indeed, wherever something

[1] The latter seems to work fairly well in the case of the Brooklyn Bridge lease, owing to the power to inspect books at any time (p. 179).

tangible is adopted as a basis, it serves fairly well. The returns cannot be easily tampered with. But theoretically a just basis of such a nature can seldom be found. There is very little relation between franchise values and the number of cars or miles of mains, for example.

There are also a few instances where all profits above a certain percentage were to go to the city (pp. 96–8), but for reasons easily understood nothing has ever been paid. Unless very strict control is maintained and a very extensive power of investigation exists, such provisions are useless. Indirectly, some compensation has been secured by requiring the street railway companies to pave a portion of the streets through which they run (p. 158), and the failure to secure more is due to poorly framed grants rather than to the unscientific character of the principle. The chief objection to this plan is that pavements are sometimes neglected, and it is difficult to tell whether the companies are really paying much or little, as the facts are all in their control.

Attempts have been made to force the corporations to share their profits with the users by limiting prices. This plan is entirely different in theory from those above mentioned, for they benefit the taxpayer principally, while the latter helps the consumer only. From point of experience, it has been only moderately successful, the difficulty being that sufficient power was not conferred to ascertain what would be a reasonable charge. Indeed, results along this line must be unsatisfactory until officials have greatly increased powers, for cost of production grows less and less, and maximum limits must be lowered accordingly. Appeal to the courts has not proved a satisfactory solution, for they are very generous towards private interests, and the knowledge at their command is very limited. No doubt the reduction of the price of gas by the legislature has been beneficial, but it is a method of control far from ideal.

The plan of requiring a reduction in price where profits have reached a given percentage (p. 98), although similar in purpose, has few of the advantages and all of the disadvantages of preceding methods. It requires strict public control to prevent evasion and deception. Where the plan has been tried, nothing has ever reached the consumer.

Thus, experience seems to favor either a fixed compensation, as in the case of wharves and ferries, or a percentage of gross

receipts. In most cases the latter will be found preferable from the nature of the enterprise.

DURATION OF FRANCHISES.

Upon this phase the experience of New York is such as to throw little light. Perpetual or long-term franchises have been the almost invariable rule, except in case of wharves and ferries. Here short-term franchises have proved far superior, and the tendency in the case of all others is to limit the period to twenty-five years, as provided by the present charter. The objections to grants for long terms are probably well founded, but there has been little opportunity to contrast one system with the other. However, it is well established that perpetual grants are entirely unwise, and that the character of the industry determines very largely whether the period shall be ten, twenty-five or fifty years. The shorter the period, the easier municipalization is made.

FRANCHISE MONOPOLIES.

Few exclusive franchises have been granted, *i. e.*, grants that are exclusive by law rather than by nature. The right to operate a street railroad upon a certain street may not be legally monopolistic, but tends to become exclusive naturally. As far as our experience goes, exclusive grants do not seem desirable, but the question is becoming less and less practical, owing to the combination of the various companies. The public service industries appear to be drifting inevitably into virtual monopolies.

POWER OF REGULATION.

Besides the methods above specified, the city has considerable power of regulation, which may be exercised in two ways: Conditions may be inserted in the grants, or ordinances may be passed after the franchise has been awarded. In the former case, there is almost no limit to the power of the municipality. It can require the grantee to do almost anything, except of course what is impossible or contrary to law. In the latter, the municipality can exact only requirements which have been authorized by law, and these powers are rather strictly construed. In neither instance have the authorities been very severe. The franchise conditions have been very lenient and often not enforced. The police regulations have not weighed very heavily, and the courts have been careful not to permit great severity.

LIBRARY OF THE UNIVERSITY OF CALIFORNIA

The most common ordinances relate to speed of locomotion, stoppage, grades, heating of cars, cleanliness, form of rails, removal of snow, testing of meters, quality of gas and electricity, opening and replacing of streets, location of conduits, stringing of wires and hours of service. These have very well fulfilled their purpose, but experience has shown that if the company is determined to resist, it is very difficult to enforce better service. The power is so great, however, that it is very easy to levy blackmail, and instances are not rare where a corporation has been placed at the mercy of the party in power.

The city's power to examine the financial operations of the companies is very small, practically nothing. It is in this direction that great advance is needed, especially since the continued combination of corporations renders public control of some sort more and more necessary. The feeling that the public has not been fairly treated and that too many and too valuable rights and exemptions have been granted to private corporations without adequate return or control, caused the enactment of the Ford Bill for the taxation of franchises.[1] Heretofore, only the tangible property had been assessed and that at a very low figure. The act provided for the assessment and taxation of the franchise as real estate. As a result, Greater New York will probably see something like $150,000,000 or $200,000,000 added to its assessed valuation. Whether the franchise corporations should be exempted from taxation partially or wholly and better service given or lower charges fixed, is a question of policy to be determined by the city. But until it is shown that the profits which accrue from tax exemption go to the user or the city, there is no possible excuse for the granting of such valuable favors. In other words, the burden of proof lies upon the corporations to show that they deserve exemption from burdens that rest upon other undertakings. They must at least open their books and show whether they have been making abnormal profits upon the capital actually invested. They must submit to stringent public control.

ELIMINATION OF COMPETITION.

The elimination of competition not only renders it more and more difficult to enforce proper control but makes control of some sort more and more necessary. It becomes particularly important,

[1] A full discussion of this measure will be found in the June, 1899, issue of MUNICIPAL AFFAIRS, by Mr. John De Witt Warner.

therefore, to call attention to the monopolistic tendency of public franchises. The process followed has been very much the same in every line. First, there was competition more or less severe. Then came combination, division of territory or a working agreement. This period came to an end either through the formation of a new company, because of the large profits made, or the breaking of agreements because of internal dissatisfaction. Strenuous competition—rate wars—followed, which ended in combination or agreements, and finally after one or two complete revolutions of the wheel, all interests merged into one gigantic corporation. In the case of electric subways this was accomplished some time ago, in electric lighting a few months since, and in street railways during the present month—March. But it has gone still further, for the same persons that control the street railways, control the electrical supply, the conduits and most of the gas supply.

This means the elimination not only of active but of potential competition. When these enterprises were in their infancy, the amount of capital each needed was small, and it was comparatively easy for a new company to be organized and to begin operation. Thus if the company or companies became too grasping, made money too rapidly, or did not treat their customers properly, a new plant could quickly be set going. This fear of future competition undoubtedly acted as a restraining influence.

Conditions have changed. Combination and consolidation have made it increasingly difficult and well-nigh impossible for a new competing corporation to be formed. The enormous amount of capital required can hardly be secured for an enterprise when success is so uncertain. Many rights and privileges are already beyond reach. The existing company has years of experience, a trained staff, a long list of customers and a large reserve fund from which to draw in case of cut-throat competition. Competition is becoming less and less a factor; the possibility of establishing monopoly prices more and more a reality.

Something must take the place of competition. Possibly the one all-powerful corporation will be dominated by altruistic motives and consider public welfare rather than personal wealth, but the evidence is not sufficiently convincing The two courses that alone seem open are: Government — municipal, state or national—control, or government operation, with perhaps an occasional makeshift in the form of government ownership and private operation.

MUNICIPAL OWNERSHIP OF DOCKS IN NEW YORK.[1]

By Bird S. Coler.

It has been stated that there is no question pending before the public to-day which concerns more vitally the commercial supremacy of the city of New York than municipal ownership of docks. In order to prove this, one should be able to establish with reasonable certainty the following premises: First; municipal ownership of the city's docks is more advantageous to commerce than either private ownership or a mixed system of private and public ownership. Secondly; municipal ownership of docks, apart from the indirect advantages obtainable by private commercial interests, is also a profitable business undertaking for the city as a municipal corporation—in other words, such municipal ownership not only involves no financial burden upon the taxpayers, but actually tends to lighten such burdens. Thirdly: In view of the effect of constitutional restrictions upon the future debt-incurring capacity of the city, such complete municipal ownership cannot be obtained within a reasonable time without a radical change in either our constitutional or statutory law.

ADVANTAGES OF MUNICIPAL OWNERSHIP.

As to the first of these proposions, *i. e.*, the commercial advantages of municipal ownership of docks. The shipping interests of this city may be divided into the three following classes: those owning dock facilities, those obliged to lease them, and the interests which, while not leasing docks for fixed periods nevertheless have occasion from day to day to obtain dock and wharfage facilities for ordinary purposes of river and coastwise traffic. The last two classes will be found practically unanimous in favor of municipal ownership; because cheaper rentals and better facilities can be obtained thereby. In the case of the first class where the question is complicated by the profits obtainable through private ownership of docks, opinions will doubtless differ.

At present about one-third in value of the entire water front of Manhattan Island is in the hands of private owners. The figures of the department of taxes and assessments show that private individuals or corporations own water front property valued at $18,681,180; while such property owned by the city is similarly valued at $38,223,-000. Assessed valuations are not, of course, a trustworthy guide to the ascertaining of what the city would have to pay for such property by purchase or condemnation proceedings; but if the assessments of such property represent fifty per cent of its true value, the amount which the city would have to pay to complete its control of the water front of Manhattan Island would be $36,000,000.

Some of the water front property held by private owners is located in districts where it might not be necessary for the city to secure immediate possession, but much of it is situated in localities of the greatest commercial importance where public improvements have been undertaken by the dock department, to the north and south thereof, and which, therefore, causes serious breaks in the uniform and continuous improvement of the water front. Much of this private property is very poorly maintained, and the wharfage and dockage facilities obtainable therefrom are altogethe

[1] The substance of this article was originally embodied in a communication addressed to Mr. Charles Stewart Smith for presentation to the Chamber of Commerce.

inadequate for commercial requirements. It is one of the misfortunes of the present mixed system of private and public ownership that the proprietors of private docks are, naturally, disinclined to expend considerable sums of money in improvements, as they realize that at any time their property may be taken by the city.

It is also unfortunately true that the progress of acquiring such property by the city has been unduly slow. The chief reasons for this are—, first, because the bonds required to be issued for the acquisition of dock property have always been regarded by the city authorities as merely an ordinary item in the total of annual issues needed for all purposes, and, secondly, because there has been less pressure of public opinion brought to bear upon the speedy development of the city's water front than has been the case in regard to such public improvements as the building of new school houses, street paving and the furnishing of rapid transit facilities. The public generally, as well as our legislators, do not seem to have appreciated the difference between expenditures made in behalf of a remunerative and profitable investment like docks, and expenditures for unproductive investments like parks, street pavements, and public buildings, which, however desirable and necessary, bring in, nevertheless, no financial return to the municipality as a corporation, and are, therefore, a direct burden upon the taxpayers.

MUNICIPAL DEBTS DIFFERENTIATED.

It may be well to consider together the second and third propositions advanced, since the arguments relating thereto are in many respects corelative. The constitution of New York limits the debt-incurring capacity of cities to ten per cent of the value of their real estate as assessed for the purposes of taxation. There is a partial exception made in the constitution in favor of bonds issued for the water supply which authorizes the issue of such bonds in excess of this ten per cent limit. In view of the fact, however, that water bonds must be counted as part of the city debt within the meaning of this constitutional restriction for the purpose of ascertaining whether it is permissible to issue bonds for other purposes, this exemption amounts to little, since no administration would willingly exceed such limit for the purpose of providing an additional supply of water and thereby prevent for years the issuing of bonds for other important improvements, unless forced to do so under circumstances of the direst need.

Recently the reasons for and the principles of these constitutional restrictions on the debt-incurring capacity of cities have been examined more critically and more philosophically than ever before. It has been realized that the real purport of these constitutional restrictions was to prevent the taxpayers of cities from becoming unduly burdened by excessive issues of bonds for public improvements. It has also been realized, however, that there are certain public improvements for which bonds are issued which do not cause any financial burden whatever to fall upon the taxpayers. A recent illustration may be found in the rapid transit contract under which the city of New York is required to issue bonds to the amount of $85,000,000. Under the terms of this contract the contractor is required to pay the interest on these bonds, and an amount in addition thereto which will suffice to redeem the principal thereof before the termination of the lease of the road. Under those circumstances, not one dollar of financial burden is cast upon the taxpayers of the city, and at the expiration of the lease the city will own an asset of inestimable value. Nevertheless the city, in order to undertake this extremely advantageous contract, has practically impaired its credit to the amount of $85,000,000. This does not seem to be either logical or reasonable.

A similar state of affairs exists in regard to the city's water system, which is in no sense experimental, and concerning which the practical results of operation through a long series of years is obtainable. This matter is one which cannot be adequately

or fully described in a few words. However, a sufficiently clear idea may be obtained of the profit derived from municipal ownership of the water system by taking the last financial year of the old City of New York, prior to consolidation (1897) as a basis. In that year the water rents amounted to $4,396,256.62. The interest paid on all water bonds outstanding in that year was $1,881,600.50

Add to this latter amount the annual cost of maintenance during that year, including the expenses of the water registrar's office..... 664,615.17

Total annual expense..... $2,545,615.67

Subtract the latter amount from the water rents received that year and there is a profit of $1,780,640.95. In the year 1897 the total bonds issued for water purposes and outstanding was $53,083,800. The city has been in the habit of providing annual sinking fund instalments for the amortization of water bonds based on extremely short redemption periods of about eighteen years. Such an instalment for all the water bonds outstanding in 1897 would amount to $2,226,748.25, or $446,102.80 more than the annual net profits of the water system. It is not fair, however, to expect any public enterprise to be so enormously profitable as to pay for itself in such a short time as eighteen years. If the annual profits of the water system, *i. e.*, $1,780,640.95, were the basis of annual sinking fund payments, designed to redeem such water bonds, the principal of the outstanding debt would be redeemed thereby in less than twenty-two years, which ought to satisfy the most zealous advocates of municipal ownership.

CITY DOCKS PAY.

Quite as forcible a showing is made by the city's investments in dock property. Up to 1895 the dock department had spent the sum of $6,508,292.50 in acquiring and improving private property from which the rentals received amounted to $462,226.54, or $7\frac{1}{16}$ per cent per annum on the total outlay. As the average rate of interest on the bonds issued to pay for these improvements has been about $3\frac{1}{2}$ per cent per annum, these rentals represent a profit over such interest charge of more than a quarter million dollars per annum, or sufficient to redeem the principal of the bonds in less than twenty years, notwithstanding the fact that the outlay referred to included the large expense of widening and paving West street. Since 1895, the dock department has conducted important condemnation proceedings in the vicinity of Bank and Bethune streets on the North river, to provide piers of extraordinary length for the use of the large trans-Atlantic steamship lines. Owing to the peculiar topography and development of this locality, the cost of these proceedings was greater than any heretofore attempted, or likely to be undertaken in the future. The blocks of ground condemned were covered by large factories with expensive fixtures and machinery, which had to be paid for by the city, and then torn down and removed. Afterwards the ground upon which these buildings stood had to be dredged out to a sufficient depth for the slips, which was a heavy expense not ordinarily incurred. This was followed by the construction of a masonry bulkhead wall and the erection of piers. The total outlay connected with this improvement was $7,536,841.60 upon which the annual interest charge is $244,947.35. The rentals received amount to $370,206.52, which shows an annual profit of $125,259.17. Ordinarily the city does not have to acquire the upland property abutting on the water front, so that this improvement makes the least favorable financial showing for the dock department that could be exhibited. Nevertheless, even in this case, the annual profit is sufficient to redeem the bonds issued in thirty-five years.

AMENDMENT OF STATE CONSTITUTION.

However revolutionary a proposition may seem to be at first sight, if, after careful discussion, it is found to be based on unimpeachable truths, it is bound ultimately

to receive the sanction of the public. There seems to be no reason why the restrictive prohibition of the constitution in regard to municipal indebtedness should apply to bonds issued for revenue producing investments which bring in a return in excess of any possible burden upon the taxpayers. It is also to be noted that under the law as it now stands the city suffers in another direction from every dollar that it invests in such enterprises. For not only is its future debt-incurring capacity diminished to the extent of such bond issues, but by reason of the fact that private and therefore assessable property is converted into public and non-assessable property by the operation, the valuation of the city's real estate for the purposes of taxation is diminished thereby, and to a proportionate extent the constitutional limit of indebtedness is thereby decreased. To state this matter otherwise and concretely, it may be said by way of illustration that if the city were to acquire private dock property to the extent of $10,000,000, its assets and its financial strength would from any proper business point of view be materially increased thereby. Nevertheless, the city's power to incur indebtedness for other purposes would not only be decreased to the extent of that $10,000,000, but also to the extent of ten per cent of the assessed valuation thereof, or by $1,000,000.

The only logical and thoroughly statesmanlike course to pursue would be to amend the state constitution so as to exempt bonds for revenue-producing enterprises. I have little patience with the theory that the city's credit is likely to be injured by the mere issue of additional bonded obligations, regardless of the question whether such additional issues will or will not add to the city's financial strength and resources. That is not the way commercial credit is rated and the credit of a city is subject to the same considerations. If a merchant seeking a loan states the annual amount of his indebtedness, a person proposing to loan him money would inquire further, first, as to the extent of his resources and the profits of his business, and secondly, if the loan were a large one, to what purposes it was intended to apply the new funds. If it appeared that by the use of this additional money the borrower would be in a position to acquire a property which in his hands could be made to yield much more than the interest on the loan, his chances of obtaining the accommodation would be vastly increased. Precisely the same considerations would apply to a city.

A PRACTICAL METHOD OF MUNICIPALIZATION.

If speedy results could scarcely be obtained from an agitation to amend the constitution in the manner above indicated, there is an alternative which, although less satisfactory in theory, may nevertheless be deemed preferable from the standpoint of expediency. Let us assume that the actual value of all the dock property on Manhattan Island not owned by the city is $36,000,000, and that it is desired to acquire this at once. Legislation looking toward the judicial means of acquiring this property is merely a matter of detail which could easily be formulated. The existing laws on this subject would need little change. Only the financial difficulty above referred to remains. Now that the rapid transit contract has been signed, and making allowance for those public improvements partially contracted for which must be pushed to completion, the city has barely any margin within the limits of the constitutional restriction. To acquire this amount of dock property within a reasonable time would, indeed, be impossible unless all other works of public improvement were stopped; impossible, however, only because the proper legislation has not been obtained.

But suppose the legislature were to authorize a commission of the highest possible standing and reputation to act for and in behalf of the city of New York for the purpose of acquiring this dock property in such a manner as not to increase materially the city's debt. The city would issue bonds to the amount of say two or three millions of

dollars to provide a working capital with which this commission could begin operations. It would then acquire dock property by condemnation proceedings to an amount not exceeding the total of this working capital. Immediately after having acquired and paid for this property, the commission would advertise for sale to the bidder offering the most advantageous terms, mortgages on this dock property in either one of two ways. The commission could either fix an arbitrary rate of interest on said mortgages, as for example four per cent, and offer to sell the same to the bidder offering to loan the largest percentage of the value of the property, or the commission could fix arbitrarily the amount of the mortgage to be sold, say, eighty per cent of the value of the property, and sell it to the bidder offering to buy the same at the lowest rate of interest. The term of the mortgage would be such a number of years as would enable the excess of rentals to be received by the city from said property over and above the annual interest charge to amortize the principal of the mortgage at the expiration of such term. These mortgages would be made by this commission acting as trustees, with recourse only to the property pledged. No bond or other evidence of indebtedness would be given by the city or these trustees. Such transactions are not uncommon among private individuals. By the terms of such a transaction the city would not legally become indebted at all. The trustees would hold the property for the joint benefit of the city on the one hand and the mortgagees on the other. The mortgagees would, of course, have the right to foreclose at any time prior to the maturity of the mortgage in the event of the non-payment of the interest. In view of the fact, however, that the uniform experience of the city in regard to dock property has been one of large profit, the possibility of such a failure is scarcely to be seriously considered, especially if the acquisition of new property were, for the present, limited to localities when such a demand exists for wharfage privileges as to render their development immediately profitable.

At the end of the mortgage period, the city would have acquired this property in fee simple without the expenditure of a dollar except the small proportion of bonds issued in the first place to provide a working capital for the commission referred to. In other words, by the mere use of this comparatively simple legislative machinery the citizens and taxpayers twenty-five or thirty years hence would receive almost without cost revenue-producing property of enormous value. In the meantime the commercial facilities of the port would have been immeasurably improved. I think it is a moderate and conservative estimate to say that the city would acquire all this dock property by the issue of bonds to an amount not exceeding twenty per cent of the actual value of the land. Very likely the percentage would be still smaller. Such an investment ought to be most eagerly sought after by capitalists. The character of dock property on Manhattan Island is so well established, and its profit earning capacity so well known, that the possibility of a foreclosure would be theoretical rather than practical. But in the event of such a course being necessary, the mortgagee has pledged specific property against which he can proceed, which is not true, in the case of the ordinary city bond.

In order to avoid adverse criticism, I would advocate limiting this course of procedure to such dock property as may be acquired in the future, giving no right to mortgage dock property heretofore acquired. As a business transaction, it seems to me that this plan is wholly advantageous to the city. The mortgaging of such property is entirely different from the mortgaging of property acquired by the city for merely governmental purposes, such as public parks. The city's docks are in theory as in fact less of a governmental than of a business nature. The only question to be answered is, first, would such a transaction inure to the peculiar benefit of the city of New York as a municipal corporation, and secondly, would its indirect results benefit the commerce of the port of New York. Both these queries must be answered in the affirmative.

STREET RAILWAY PROBLEM IN MILWAUKEE.

By John A. Butler.

The history of the street railway problem in Milwaukee under private ownership is briefly as follows. Before 1874 street railway franchises were limited in duration to twenty-five years. In that year extensive new franchises were granted by the council and a fifty-year term was fixed for both the old and new grants, all franchises to expire in 1924. Subsequent grants, with a few exceptions, also terminate then. Between 1888 and 1894 outside capitalists consolidated the five separate companies then in existence into a single organization known as the Milwaukee Street Railway Company. The price paid ($6,884,000) for the old-fashioned mule and horse lines appeared to be exorbitant, but it will be observed that it was paid for a long-term privilege. It is needless to add that it has been "saddled as a charge upon the business. Since then that charge has been placed against every public demand concerning that business, and it is destined indefinitely to block the way for future public benefits otherwise practicable."

The adoption of electricity as a motive power caused additional expense and the further issue of securities, which resulted in a capitalization in 1895 of about "three times the value of the company's physical property, and the later bondholders, for reasons understood by themselves, had a receiver appointed." An admirable article on the subject in the Chicago Tribune, from which the above quotations are taken, adds: "In the subsequent 'scaling down' some of the water, though precisely what fraction no outsider knows, was squeezed out, and at the beginning of 1896 the property passed into the hands of The Milwaukee Electric Railway and Light Company, organized for the purpose and now in charge." They paid $5,000,000 for the property at auction and watered it again. The capitalization of the company is nearly $15,000,000. Nevertheless, it has constantly pleaded poverty when lower fares have been demanded. It operates 139.56 miles of road, 117.11 miles of which are within the city limits. It owns all the electric lighting business in the city and owns the stock of a suburban company which has about fifty-five miles of track connecting Milwaukee with Waukesha and Racine, two small but wealthy and enterprising cities.

THE ISSUE.

Up to 1894 four-cent fares and five-cent cash fares had prevailed on the original lines of road, although they were entitled to charge a fare "not to exceed five cents." Transfers also existed between lines of the same system. After the consolidation these fares continued, and transfers were to a limited extent given between different systems. Soon, however, the ticket system was abandoned and a straight five-cent fare exacted. To say that this was a shortsighted policy is to state the case very temperately, but it was in keeping with the general attitude of the company since that time, and was naturally and unavoidably regarded by all classes of citizens as sufficient cause for popular resentment. Further, what is now known as the street railway ring has long been believed to be far too influential in the politics of the city and state, and when through the supposed influence of the company, its taxes were reduced to a little less

than $20,000 a year by the legislature. it required very little to arouse the people to a state of feeling bordering on revolution. At the time of the strike in 1896, the public sympathized very generally with the demands of the employees, violent demonstrations were not infrequent, omnibuses again appeared on the streets and were extensively patronized for a considerable period, with a corresponding decrease in the company's receipts. The company's general attitude was further emphasized by the fact that it did not adopt vestibules until actually forced to do so.

The result was that the company's influence in city politics temporarily declined, and an ordinance was introduced to compel the restoration of tickets. This was followed by the introduction of a general transfer system by the company and the abandonment of the ordinance by the council. The people however were far from satisfied, and the discontent became so profound and far-reaching that the local political platforms "emphatically demanded reduced fares, suggested legal action to that end, and advocated both competition and municipal ownership as safeguards against monopoly."

LOW FARE ORDINANCE ILLEGAL.

On March 30, 1896, just prior to the election, another low fare ordinance was introduced in the council, this time requiring the company to sell eight tickets for twenty-five cents, good between 5 and 7:30 A.M. and P.M., and six tickets for twenty-five cents, good at all other times, with general transfers in either case. On June 8, 1896, while the low fare ordinance was pending, the street railway company sent in a communication urging its abandonment and representing that if that and all other "hostile legislation" as well as a certain pending grant to a new company, should be foregone, the company would "resume the sale of commutation tickets by the first day of July, 1897." The council declined to accept the proposition and the ordinance was passed.

Its enforcement was promptly enjoined by the United States Court and the result of the subsequent trial was a decision by Judge Seaman in May. The issues were the authority of the city to pass the ordinance and the reasonableness of the proposed reduction of fare. The former issue was not passed upon and the reduction was declared unreasonable. The court, however, recognized the principle of law that regulation of rates by public authority is legitimate, and treated it as beyond question that in the pending case the exercise of such authority was within the power "undoubtedly possessed by the state." It developed in the trial that the business appeared to have paid on the amount allowed as its fair investment of capital, only 5.2 per cent as claimed by the city, 2.3 per cent on the company's claim and 3.2 per cent according to the calculation of the court. It was therefore held that the investment had not produced "earnings in excess of an equitable allowance." In fixing the capital on which a reasonable income should be allowed, Judge Seaman while declining "to limit that amount to the cost of duplicating the plant, likewise declined to fix it at the purchase price paid for the property plus the cost of permanent improvements." The testimony showed that the property had cost $8,885,644 up to that time, but it was also shown that the plant could be replaced for $5,000,000. The court determined upon $7,000,000 as the amount "entitled to equitable consideration" as a basis for income. It was definitely held "that an inflated, speculative price, paid, is not the legitimate measure of capital investment for purposes of income." Of course, the reasonableness of the reduction in fare was determined on the showing of the past income of the company, and had relation to a more or less definite period, during which the income had been seriously crippled by the strike.

PEOPLE DECEIVED.

The decision was well received but it was fully realized that an ordinance could be introduced with better results at some future time. The company was therefore alert and has ever since been striving for an arrangement with the city that should take the form of an unassailable "contract." At the next city election in 1898, while the four-cent fare case was still pending, the air was full of denunciation of the road. The platform of one party favored "the derivation of a revenue by the city from franchises," and declared in favor of municipal ownership of public utilities. The platform of the other party was equally uncompromising and vigorous. David S. Rose, the successful Democratic mayoralty candidate, was a man of great force and capacity for active work, and possessed the kind of oratory which carries everything before it, like a cavalry charge, in a municipal campaign. The vigor and effectiveness of his tactics were extraordinary, and his assaults upon the street railway company were only exceeded in vigor by his expression of unconquerable determination to fight for the public demands to the bitter end. He was elected by a large majority by a confiding public which alternates, in its search for municipal saviours, between the two national parties in their civic roles with a patience which would be sublime if it were not ridiculous and absurd.

The mayor was elected largely by Republican influence and votes, and the four-cent fare case having been decided, negotiations between the city and the company were entered into, the latter fully convinced that, in view of the power of the state to control fares, the only guaranty of permanent high fares was a "contract" with the city that would be sweeping and impregnable. The mayor soon sent a special message to the council, recommending that a new lowfare ordinance be immediately passed and "if the street railway company refuses to comply with the new ordinance, then enforce it if the power of the courts is adequate, and never rest until the desired result is obtained." Yet, on November 21, 1898, after six months of unremitting and conspicuous work in the interest of the city, there appeared to be a complete change of policy. Instead of legislation such as was expected from him the mayor laid before the council a mass of correspondence with the company together with a proposed agreement, the three principal terms of which were: (1) A five-cent fare, and that too not as a maximum subject to public regulation, but as the rate which the company should have the right to charge during existing franchises as well as additional further extensions; (2) that "all the rights of the railway company under such ordinance" should be cemented into "a contract" between it and the city; and (3) that the company should make annual payments to the city rising during the first five years from $50,000 to $100,000 and remaining thereafter at the latter figure.

PUBLIC INTERESTS DISREGARDED.

This proposal was met by a storm of almost universal protest, the temper of which is fairly indicated by three quotations from the utterances of a mass meeting on the subject. The chairman said: "We want no bonus that shall make the poor man pay the taxes of the rich." Another speaker said: "A five-cent fare may not be too much now, but the time may come when three cents or two cents will be too much." A third declared: "We will not barter away our control over the street railway company for any price." The company hastened to withdraw the proposition and the mayor's activity in street railway matters thereupon appeared to terminate.

The present ordinance is of the most obnoxious character and has had a most dramatic history. The adroitness with which it was drafted makes it probable that it could not have been the exclusive product of the special council committee which was appointed by resolution to bring about a reduced rate of fare. It provides among

other things (1) for a ten years extension of franchises terminating in 1924, up to December 1, 1934; (2) the grant of twelve new franchises covering about sixteen miles of streets, also extending to 1934, with no obligation to build within two years and then only on one-fifth of the mileage; (3) no obligation to build on the balance of the mileage until the city can make it appear that it would pay and until streets are brought up to grade by the city; (4) a rate of fare including one transfer that "shall be five cents" instead of "not to exceed five cents," with six tickets for twenty-five cents or twenty-five for a dollar good between 5:30 and 8 A.M. and 5 and 7 P.M. until January 1st, 1905, etc. This was evidently intended as an agreeable overture to the laboring men. The ordinance was passed in substantially this form, except that "shall be five cents" was changed after a struggle to "not to exceed five cents." Thus the introduction of public ownership has been delayed for thirty-five years, the present company is established in its monopoly during that period, and the public right to regulate fares has been surrendered.

Of course the ordinance was not passed without the most forcible protests by the people, who made a demonstration not likely to be forgotten by those who participated in it. All but one member of the special committee of the council stood solidly for the ordinance. It was believed that the company had secured the majority of the aldermen, composed nearly equally of representatives of both parties. On November 15th, 1899, a mass meeting was called by the Municipal League in which strong and unequivocal resolutions were passed, and a large delegation appointed to appear before the council committee. Shortly afterwards the same organization held two mass meetings remarkable for their demonstration of intense public feeling. A citizens' committee came into existence and added materially to the force of the popular protest. It held enthusiastic mass meetings in all parts of the city and crowned its vigorous crusade with ably conducted legal proceedings.

COURTS IGNORED.

Two weeks prior to the passage of the ordinance, it was believed that the company had secured the majority of the aldermen and the council would pass the measure at the next regular meeting. The citizens' committee on ways and means procured an injunction on the ground that the council was conspiring with the railway company to grant and extend franchises of immense value for a grossly inadequate consideration. It was alleged that certain citizens had been bought off by promises of reimbursement for damages to property, that the ordinance was improperly published and illegal, and that in granting an extension of ten years the council exceeded its authority. The injunction comprised furthermore a statement of the points given numerically above. It enjoined the council from passing the ordinance, the city clerk from engrossing and publishing it, and the company from accepting it, the ordinance having provided for its acceptance in writing by the company. The trial judge, on a motion to dissolve, held the injunction valid.

The mayor and aldermen ignored the injunction and passed the ordinance, the presiding officer closing the doors of the council chamber against the possibility of public protest. The company appealed from the order granting a temporary injunction. The trial court found the mayor and board of aldermen in contempt for violating the injunction, and they also appealed to the supreme court.

In considering a writ of prohibition which was sued out by the mayor and aldermen, that court substantially held that the common council in granting franchises to street railways acted by delegation of authority from the legislature, that its action was of a legislative character, and that the courts could not interfere by writs of injunction, but it also plainly indicated in the opinion of good lawyers that the people are still not without a remedy against the exaction of unreasonable fares.

RECENT ACTION.

The ensuing municipal campaign and election form a signal illustration of the power of machine rule based upon perfect organization. Mayor Rose, who, together with a majority of the aldermen of both parties, passed the ordinance in spite of public protests and injunctions, were *persona grata* to the street railway company. He had been elected two years before on a free silver platform, but several of the most influential Republican leaders in Wisconsin, connected with the Milwaukee Street Railway Company, were bound to him by ties of gratitude. It is believed that private interests, represented by long-time leaders of the two great parties, had before been adjusted on a "non-partisan" basis, while the partisan battle was going on with every degree of party jealousy and passion. This combination soon earned the journalistic sobriquet of the "Payne-Pfister Democracy."

It was fully expected that the nominations in each party convention would be controlled by street railway leaders, and that an excessively conservative, irreproachable, but weak mayoralty candidate would be nominated in the Republican convention. The one great fear of the friends of the road seemed to be that it might not be able to prevent the nomination by the Republicans of a strong candidate in the person of Henry J. Baumgaertner, a man of irreproachable character, and long experience in the common council, who was known to favor independence in city politics, who had been the steadfast and irreconcilable representative of his constituents, and who strongly favored the establishment of a public electric lighting plant.

Mayor Rose was the inevitable candidate of the "Payne-Pfister Democracy." He was able to offer the voters a record of an economical administration, with the debt reduced about $1,400,000 below the limit. He also appeared to have personally secured a four-cent fare for thirty-five years, to be extended to working men during certain hours at once, and to the people at large at the end of five years from the present time. It is true that the terms on which it was granted were far less advantageous than those offered in 1896. It is also true that an unconditional four-cent fare had been promised, and that many millions in value in the shape of twelve additional franchises and a ten years extension had been conceded to the company for the merest mess of pottage, when their retention for a few years would have secured a much more valuable equivalent. But it was easy to impress upon the ignorant the conviction that "something had been done." The Mayor had also aided extensively in advertising the city abroad, and was the business man's friend. He had been sustained in the injunction suits by the supreme court, and had exhibited a steadfastness and courage which appeal strongly to the masses. Moreover, in the long street railway agitation there had been highly sensational features, and an injudicious indulgence in violent speech in the ranks of the reformers nearly certain to react in his favor, perhaps, sufficiently to elect him. He stood upon a platform largely made up of local issues, with a promise of an electric light plant. To all this he added the training of an adroit and experienced lawyer, an unassailable self-confidence, and extraordinary energy and power of organization. These were his sources of strength.

PARTY LINES BROKEN.

Against him stood the non-partisan Municipal League; the so-called citizen's "Committee of Ways and Means," which appeared suddenly, and soon developed into a factional organization within the Republican party; the *Sentinel*, the leading Republican paper of the state, which was conspicuously energetic in favor of better conditions; the *Daily News*, one of the leading Democratic papers; and finally the Populists, who had materially aided in Mayor Rose's former election, but were offended by

the breach of faith of which his administration had been guilty in local matters. Many members of the League were anxious to bring such Republicans and Democrats as were opposed to ring rule to participate in an independent movement. The logical candidate appeared to be Mr. Henry J. Baumgaertner. The caucus law offered many difficulties, but it was believed that such a movement would conciliate many voters who could not vote for him as the candidate of another party without doing violence to their ideas of party fealty. The desire to keep the movement within party lines was, however, very strong. The Committee on Ways and Means caused the circulation of petitions for his nomination within party lines, which were signed by 10,000 citizens of all parties, *a large number of whom wished him to run independently.*

The prospects were not encouraging. The entire party machinery was directed toward the nomination of a man not obnoxious to the ring. Every Republican ward club was against Mr. Baumgaertner; and, a day or so before the caucuses, his followers showed great interest in the League's policy. The Populist leaders presented an admirable platform, devoted wholly to local issues. An arrangement was made that if the caucuses proved disappointing, Mr. Baumgaertner's friends should urge him not to go before the convention, but to run as an independent candidate. The Populists agreed to tender their rights on the ballot in such an event, and to withdraw their candidates in case of Mr. Baumgaertner's nomination by the convention. Fortunately or unfortunately, the caucuses of the following day were overwhelmingly in his favor. He was unanimously nominated in the convention, and the Populists duly kept their pledges.

REPUBLICANS BETRAY THEIR CANDIDATE.

In the ensuing campaign the Republican county committee was apathetic. The large sums of money which are usually forthcoming could not be had. The men who had pushed the nomination were ungraciously informed that they must furnish the sinews of war. They had nominated their candidate; they might elect him. The campaign of Mr. Baumgaertner was vigorous and enthusiastic and at the outset swept everything before it; but while his experience, honesty, and ability were unquestioned, he lacked the ingenious sophistry of his opponents. He was not a demagogue. He was only an honest and competent man. He lacked the necessary money, while the canvass for Mr. Rose's election was marked by abundance of necessary funds, perfect organization, and a bold and specious justification of what had passed, coupled with unbounded promises for the future. The unenlightened portion of the influential classes were made to believe that Mr. Baumgaertner's election would ensure a reign of socialism, and they were easily persuaded in their own minds that Mr. Rose was the safer man.

The result was extraordinary. The people voted very largely without respect to party lines. A very large vote was polled. Thousands of Democrats voted for the Republican candidate, and heretofore solid Republican wards, conspicuous for wealth and "good citizenship," gave Mr. Rose a large vote. His majority at the preceding election had been about 8,000. It was now reduced to a little over 2,000. But he was elected.

His first message to the council is very weak in regard to an electric lighting plant, and very strong in condemnation of civil service, saying, "I believe that the interests of the city will be better subserved by dispensing with civil service in municipal affairs. * * I only regret that your honorable body [the council] does not possess the power to repeal this law." Of the twenty-five aldermen who voted for the street railway ordinance, only seven were re-elected, but it is not yet known that their successors are not favorable to the ring and will not vote a long electric light contract to the street

railway company. The council appears to have been thoroughly organized on a street railway basis, although fifteen of the seventeen who voted against the ordinance were re-elected. The question of an electric lighting plant was submitted to the voters, but was so generally neglected by campaign orators that it was partially lost sight of. Of the 17,097 who voted on it, 15,644 favored such a plant, a significant result when it is remembered that under the circumstances those who were opposed to a public lighting plant would hardly neglect an opportunity to place their disapproval on record.

It is not necessary to give the varying explanations of the result, but its lessons are perfectly plain. Two years ago a Democratic city government was elected in this Republican city because of its unequivocal promises to promote just relations between the city and the street railway company, and to further municipal ownership of certain public utilities. Substantially the same government has been re-elected because a sufficient number of voters were finally made to believe that something had been actually accomplished in that direction. In other words, the demand for municipal ownership and an interest in reduced fares was the motive of the 22,702 citizens who voted for Mr. Baumgaertner and of a very large proportion of the 25,076 who cast the ballots which elected his opponent. The vote was unusually large owing to the local issues involved, and if they were dealt with by the voters blindly, in some degree, the fact remains that public apathy is lessening and there is a marked indication of an extensive and unchanging public opinion in favor of municipal ownership and more just relations between public service companies and the city. The contest, in spite of the party features in the platforms, turned wholly upon local issues, and the unprecedented independent voting goes far toward the future obliteration of party lines in city elections.

In a recent conversation with a distinguished Unitarian clergyman, long a resident of Glasgow, who is well posted on its government, I asked who established the just and democratic relations which exist between that city and public service companies. He replied with evident and justifiable pride, "It was brought about by the great merchants of Glasgow." When will our American men of wealth realize that their own best interests are, in the long run, dependent upon the greatest good of the greatest number?

BOSTON MUNICIPAL SUBWAY.

By B. L. Beal.

The street car transportation conditions in the city of Boston as they existed prior to 1897 can be most easily understood by imagining two fans place at short distances apart with their opened ends pointing away from one another. This is particularly the case of the west side traffic. Here from the south, are lines from Dorchester, Grove Hall and Roxbury, all meeting on two tracks on Shawmut avenue; lines from Roxbury, West Roxbury and Jamaica Plain, all meeting on two tracks on Tremont street; lines from Brookline and Brighton and various "cross-town" lines, all meeting on two tracks on Huntington avenue; and lines from Brookline, Brighton, Watertown, Arlington and Cambridge, all meeting on two tracks only on Boylston street. At the junction of Boylston and Tremont streets, all of this traffic was brought on a single set of rails.

A similar condition of affairs, although less aggravated, existed at the north end of the city, Scollay square being the converging point. Between Scollay square and the junction of Boylston and Tremont streets, a distance of about a half mile, all of this traffic, amounting then to about 50,000,000 passengers a year, was carried on two tracks, the result being that the street was badly congested and during the busy period, from 5 to 6:30 P.M., there was an almost uninterrupted line of cars, so close together that one could almost walk the entire distance on the car roofs, and so obstructed at two or three points by crossings of tracks that it was not an unusual occurrence for a car to occupy twenty-five minutes in making the distance.

For many years the question of relief from this congestion had been agitated, but there was no unanimity of opinion as to the proper method of relief and the question was complicated by the fact that a large part of the district borders upon Boston Common, a breathing spot of about forty-eight acres in the heart of the city, and that all efforts to make any use whatever of this space either by taking a portion of it to widen Tremont street or by laying tracks across it met with an opposition so fierce as to speedily demonstrate the futility of attempting relief in that direction.

An elevated road was proposed but was rejected by popular vote. In addition, the property damages would be so heavy that capitalists could not be found. It was proposed to take advantage of a series of rear passages running between Washington and Tremont streets to cut through a wide street, which would be given up to car traffic entirely, having four tracks But again the question of damages was a very material one, in addition to which the added danger to life and limb by four sets of tracks at every intersecting street was a potent element.

In 1892 an unpaid commission consisting of the mayor, the city engineer and six other reputable citizens reported to the legislature a comprehensive plan of the rearrangement of the traffic of the city which included a subway under a part of the congested district. The only immediate outcome was the passage by the legislature of 1893 of a law authorizing the appointment by the mayor, upon the acceptance of the act by the city government, of a commission of three persons to construct a subway within certain limits at an expense not to exceed $2,000,000. This commission in 1894 re-

ported to the legislature that the scheme was not sufficiently comprehensive, and recommended its enlargement and an increased appropriation. The legislature of 1894 increased the membership of the commission by two, its powers and the extent of the structure which it could build, and the appropriation to $7,000,000.

This commission organized August 15, 1894, and after expending about six months in the study of the problem, published an estimate that a subway substantially according to the lines laid down in the act could be built for $5,000,000, and on March 28, 1895, the work of construction was begun. It was practically finished August 15, 1898, and its total cost has been about $4,850,000, including alterations not contemplated in the original estimate, but requested by the lessee corporation, involving an expenditure of $200,000. Its length is about 1¾ miles, and its trackage, reckoned as single track, is a little over five miles. A portion of it was opened to public travel September 1, 1897, and the entire subway since September 3, 1898. In the first year of its operation as a whole, it handled at least fifty million passengers, one station alone, that at Park street, accommodating 27,400,000 passengers, ranking fourth among the stations of the world.

Upon its completion, and in compliance with the terms of the statute, the tracks on Tremont street, between the two points named above and also for a short distance on Boylston street as far as Park square, were removed. The legislature of 1899 authorized the replacement of these tracks provided the act of authorization was accepted, the question to be submitted to the people at the municipal election. At that election the popular vote was two to one against replacement of the tracks.

The subway, having four tracks, doubled the trackage in the Tremont street district, and, inasmuch as the way is always clear for the passage of cars, there are no delays by team traffic and by necessary waits at street crossings for the passage of pedestrians. Furthermore, all grade crossings are avoided by the sub-subway, so that the trip from Park street to Public Garden or to the junction of Shawmut avenue and Tremont street, before the completion of subways always a matter of doubtful duration, is now made on schedule time, namely, about four minutes. Not only is there a large amount of time saved to the passengers, but the capacity of the tracks being increased the service has been improved by additions to the numbers of cars without any loss of time. Previous to the construction of the subway the maximum capacity of tracks on Tremont street was about 200 cars per hour each way, while at present the capacity of the four tracks is considerably over 400 cars per hour each way. The capacity of the subway is now limited by that of the surface tracks leading into it.

The subway is leased for a term of twenty years, the limit of time allowed by law, to the West End Street Railway Company, and is equipped and operated by the Boston Elevated Railway Company, the lessee of the first-named company. The amount paid for rental will during the term of the lease never be less than 4⅞ per cent of the cost of the subway and under certain circumstances, by reckoning the cars runs through it on a toll system, it may exceed that sum.

The money for construction was the proceeds of forty-year bonds issued by the city, a portion at 4 per cent interest and the rest at 3½ per cent. Including the premiums from the sale of these bonds, which went into the sinking fund, it is calculated that the amount paid for rental, if continued during the term of the bonds, would pay the interest annually and meet all sinking fund requirements so that the sinking fund will be amply sufficient to extinguish the debt at maturity.

Briefly the subway has been a success in relieving blockades in the streets, in re-reducing the time in passing through the congested district, and in improving the general conditions of service. In popularity it has exceeded the expectations of its advo-

cates and has already led to a proposition before the legislature for similar service on the east side of the city.

This proposition, however, is quite different from the above. The present mayor is opposed to further increase of the public debt, even when such increase is represented by an income producing asset, as in the case of the subway. Therefore, those favoring an east side subway, avowing as their motive the uncertainty of securing a tenant, have presented a bill providing that, although the work of construction shall be carried on as in the case of the present subway by the Boston Transit Commission, the cost thereof shall be borne by the Boston Elevated Railway Company. The bill also extends the lease of the present subway to a forty year term and provides that at the expiration of that period the city may, if so authorized by popular vote, buy the new subway at a fair valuation. While there seems to be a unity of opinion as to the necessity for another subway, there is strong opposition to the idea of private ownership. The matter is still before the legislature.

SKANEATELES WATER WORKS COMPANY *v.* VILLAGE OF SKANEATELES.

(Decided by the New York Court of Appeals in 161 N. Y. 154)

1. VILLAGES—MUNICIPAL WATER SUPPLY—ACQUISITION OF WORKS OF PRIVATE CORPORATION. The act (L. 1875, ch. 181), authorizing villages to supply themselves with water and permitting the acquisition of the works of any private corporation that may be supplying the municipality with water, does not make it the duty of the water commissioners to acquire the property of the existing corporation or corporations.

2. VILLAGE NOT BOUND TO CONDEMN PROPERTY OF EXISTING WATER WORKS CORPORATION. Under the act of 1875, the right to determine whether the property of an existing private water works corporation should be taken or not is submitted to the determination of the local authorities; and, hence, the refusal of the village to acquire such property by proceedings *in invitum* does not tend to support the claim of the private corporation for an injunction against the construction and operation of an independent system of water works by the village, the act of 1875 being valid. * * *

4. WATER COMPANY'S FRANCHISE NOT EXCLUSIVE. In conferring a franchise upon a company formed under the act of 1873, the village, by not expressly parting with it, reserves the right to grant a franchise to another corporation to carry on the same business in the same territory; and, under the authority acquired from the legislature, the municipality has the power to determine whether the right reserved upon the granting of the first franchise shall be exercised by a private corporation or by the municipal corporation. * * *

PARKER, Ch. J. The plaintiff, a domestic corporation organized pursuant to the provisions of chap. 737 of the Laws of 1873, and the acts amendatory thereof and supplemental thereto, brought this action for the purpose of obtaining a permanent injunction against the village of Skaneateles, its president, trustees and water commissioners (whom, for convenience, we shall refer to in the course of this opinion as the village), restraining them from constructing and operating in the village of Skaneateles an independent system of water works, for the purpose of supplying it and its inhabitants with water.

Such steps were taken on or about the 5th day of April, 1887, by the village of Skaneateles as, in conjunction with the acts of the plaintiff, operated to vest in the latter a franchise to maintain and operate within its corporate limits a system of water works for furnishing to the village and its inhabitants pure and wholesome water upon certain terms and conditions, which, in effect, were that the company should have its works in general operation by the 1st day of December, 1889; that it should not charge or collect at any time a greater sum than forty dollars per annum for each hydrant; that at such rate it should furnish all the hydrants required by the village, and should not sell or transfer to non-residents of Skaneateles the rights acquired by the granting of the franchise. The works were not completed within the time provided for, but before the expiration of such period the trustees of the village of Skaneateles passed a resolution extending the time for the completion of the works until December 1st, 1890, and declared that thereby the franchise theretofore granted to the plaintiff was renewed. Within the period of time designated by the latter resolution the works were completed and the plaintiff commenced to supply the village and its inhabitants with water and so continued under its contract for a period of about five years, at which time the contract with the village expired and was not renewed. Whether the record discloses the real reason for the refusal of the village to renew the contract is open to doubt, but the evidence indicates that the plaintiff having found that it had lost money, foolishly asked for ten dollars more per hydrant than it was entitled to charge under

the terms of the grant by which the franchise was created. This was the first mistake, but not the only one in the chapter of errors which led to the appointment of a board of water commissioners in pursuance of chapter 181 of the Laws of 1875, who thereupon took the necessary steps to have a special election held for the purpose of voting upon the proposition to construct an independent system of water works for the village. The vote was largely in favor of an independent system, and the water commissioners proceeded at once to secure such a system. The situation presented to the water commissioners is described in the findings of the learned referee as follows: "The system of water works so constructed and completed as aforesaid, by plaintiff, was, and at all times since has been and now is, a complete and adequate system. Said corporation has laid pipes in substantially every street of said village; no complaint has been made that the water furnished by said plaintiff has not been pure and wholesome, or that the sufficiency thereof has not been adequate, or that the pressure thereof has not been adequate for fire protection and all other purposes." They further say that the source from which the plaintiff obtained its water, namely, Skaneateles lake, was the only source from which water could be obtained for supplying and furnishing the village and its inhabitants with pure and wholesome water. Necessarily, therefore, it was apparent that the public health could not be advantaged by an additional system of water works, and that there were no public interests requiring it; and as the statute under which the village was proceeding to acquire a system of water works of its own permitted the acquisition of the plaintiff's water works, rights and franchises by condemnation proceedings, it would seem to the average mind that common fairness, if not common honesty, should have dictated that course. It is true that the village offered to pay to the plaintiff $24,000 for its property, a property mortgaged for $50,000, but the plaintiff declined to take that sum, and instead requested the defendant to take its property by condemnation proceedings, as the statute authorized. So anxious was the plaintiff to have that course taken, that it even offered to pay all the expenses of such a proceeding, except the defendant's counsel fees; but the village would not avail itself of the permission of the statute, or of the invitation of the plaintiff, and for an excuse for such an unconscionable performance says that it might have been compelled by a proceeding in court to pay to the plaintiff something more than the actual cost of duplicating its works; in other words, it feared that the court might hold that the franchise had some value, and that the money lost during the years required to educate the people up to the desirability of taking water should be compensated for.

It is the experience of all attempts to introduce water into villages and small cities that the number of individual patrons at the outset is very small, because their houses are not piped, and they are without bath tubs and other appliances which go with the use of water supplied under pressure. The houses erected after the construction of water works are, of course, made ready for connection with the pipes of the company; but the old houses are brought in very slowly; many never come in, while a small percentage of the others are brought in each year, as the owners find themselves able to enjoy the luxury afforded by the water system, or as they may be persuaded that the necessary expense ought to be incurred for reasons of health or comfort. This means in almost all cases losses for the first few years, until a sufficient number of people have become patrons to put the plant on a paying basis. The theory of the defendant seems to be that the proper way to treat such a corporation as the plaintiff, promoted in this instance, as it appears, by defendant's citizens, is to let it go on and build water works, losing money each year while it educates the people up to the point of using the water, until years have passed away and the plant has at last

come to a paying basis, and then duplicate its plant and take over a paying business for the simple cost of the construction of new works, and it claims the permission of the legislature to take that very course.

On the other hand, the appellant urges that the statute authorizing villages to supply themselves with water and permitting the acquisition of the works of any private corporation that may be supplying such municipalities with water, also makes it the duty of the water commissioners to acquire the property of the existing corporation or corporations. But after a very careful examination of the statute it seems to us very clear that this is not so.

It is probable that the legislature mistakenly assumed that such authorities would not act unjustly or oppressively, but would recognize the property rights of others. Be that as it may, the right to determine whether the property of an existing water works corporation should be taken or not, is clearly submitted to the determination of the local authorities. The refusal of the defendant, therefore, to acquire the plaintiff's property by proceedings *in invitum* does not tend to support the plaintiff's claim for an injunction. The defendant has done precisely what the statute authorizes, and all that remains for the court to determine is whether the act was within the legislative power, or void because in contravention of the organic law. Our first inquiry naturally is as to the nature of the rights acquired by the plaintiff under and by virtue of the franchise granted to it. The answer is readily to be found in the decisions of this court in *Syracuse Water Co.* v. *City of Syracuse* (116 N. Y. 167), and *Matter of the City of Brooklyn* (143 N. Y. 596). Indeed, the principle was settled in the *Charles River Bridge Case* (11 Peters, 548), where it appeared that the legislature of Massachusetts, after passing an act incorporating the plaintiff for a term of years, with power to erect a bridge and collect the tolls, etc., subsequently incorporated the defendant with power to erect another bridge very near the first; the act provided that after the expense of the construction of the first bridge had been reimbursed to its promoters, it should be surrendered to the state and become a free bridge. It was insisted that the act incorporating the defendant impaired the obligation of the contract between the state and the plaintiff, and was, therefore, in violation of section 10 of the Constitution of the United States, providing that no state shall pass any law impairing the obligation of contracts. While the court was divided upon the question whether there could be implied from the contract on the part of the state an agreement not to authorize, contiguous to that of the Charles river bridge, another bridge, which would ultimately become free and thereupon render the plaintiff's bridge of little or no value, the majority of the court agreed that the contract between the state and the plaintiff was not exclusive, and that an agreement not to authorize the erection of another bridge could not be implied by reason of the settled rules of construction of statutes adopted under the system of jurisprudence which we have derived from the English law, viz.: that public grants are to be construed strictly so as to prevent rights from being taken from the public, or given to a corporation, beyond those which the words of the grant, by their ordinary construction, convey. The doctrine of that case has been accepted by this court and frequently applied, as in *Auburn & Cato Plank Road Co.* v. *Douglass* (97 N. Y., 444); *Chenango Bridge Co.* v. *Binghamton Bridge Co.* (27 N. Y. 87); *Power* v. *Village of Athens* (99 N. Y. 592); *Syracuse Water Co.* v. *City of Syracuse* (116 N. Y. 167), and *Matter of The City of Brooklyn* (143 N. Y. 596.)

In the *Syracuse* case, the plaintiff was incorporated by chap. 284 of the Laws of 1849 for the purpose of furnishing water to the city and its inhabitants, and this it did from the time of its creation down to about the time of the commencement of the action, which was brought for the purpose of restraining the defendant, the City of Syracuse, from granting to the Central City Water Company the right to place pipes and

other constructions in the city of Syracuse with the view to supply it and its inhabitants with water. The plaintiff's charter provided that it should, when requested, furnish water to the common council of the city for the extinguishment of fires and other purposes, on terms to be agreed upon between them, and in case they should not agree, a provision was made for a determination of the disagreement by commissioners to be appointed by the Supreme Court; the charter also provided that any time after the expiration of the twenty years the common council should have the right to assume all the property rights, powers and franchises of the company on paying to it an amount to be ascertained by a method prescribed. For nearly forty years the Syracuse Water Company continued to furnish water for the city and its inhabitants, and then, in pursuance of chap. 85 of the Laws of 1880, the Central City Water Company was incorporated, and in its articles of incorporation the object of its creation was declared to be to supply the city of Syracuse and adjacent villages with pure and wholesome water for domestic use, for fire protection and other public purposes. The common council of the city thereupon adopted a resolution authorizing such company to construct and operate water works in the city of Syracuse for the purpose of supplying it and its inhabitants with water.

It was contended by the Syracuse Water Company in this court that the provision in the grant requiring the company on request to furnish water to the municipality, was in legal effect requiring the company to furnish and the city to take water for fire and other public purposes, but it was decided otherwise. The grant to the water company was held to give to it the privilege of supplying all the water that the city or its inhabitants might wish to take, but not with the right to supply them all the water that they might care to use.

The doctrine of that case was adopted and approved in *Matter of City of Brooklyn* (*supra*), which was a special proceeding instituted for the purpose of acquiring the property and franchises of the Long Island Water Supply Company. The commissioners of appraisal refused to hold that such company had an exclusive right to furnish water to the territory supplied by it. This position was sustained in this court on the ground that the franchise granted was not exclusive.

Under the settled law of this state, therefore, the franchise that the plaintiff here acquired was not exclusive and did not prevent the village from proceeding under the act of 1878, and the acts amendatory thereof, to grant a franchise to another corporation to construct water works in the village, and at the same time contract with it to take such water as the village should need for fire protection and other public purposes. Indeed, the appellant concedes this to be so, but at the same time insists that the attempt of the village to perform such service for itself presents a very different question, for while the effect of granting a franchise to another corporation might be to impair and possibly ultimately to destroy the value of its plant, the construction and operation of water works by the village, it is argued necessarily has that effect, because it takes away the power of the company to supply the village, the latter having placed itself beyond the necessity of being thus supplied; and the village having also undertaken the business of supplying its inhabitants, the power of the company to supply them is at least impaired, and, hence, it is urged that the obligation of its contract is impaired within the meaning of the Federal Constitution.

All franchises come from the state, although the legislature may, and often does, delegate to municipal authorities the right to take final action in the procedure resulting in the creation of a franchise. (*Ghee* v. *Northern Union Gas Co.*, 158 N. Y. 510, 513.) The effect of such action, if within the legislative permission, is to allow the grantee to carry on the business authorized by the franchise. All rights not expressly granted by

it are, as we have seen, reserved. The rights thus reserved include in part the granting of a franchise to another corporation to carry on the same business in the same territory. The power to grant the additional franchise, as well as the first one, the municipality acquires from the legislature, which has the power to determine whether the rights reserved upon the grant of the first franchise shall be exercised by a private corporation or by the municipal corporation. It may well be that competition by the municipality more seriously affects the earning capacity of the private corporation than would the competition of another private corporation; but the test of legislative power in such case is not whether the agency selected to construct and operate competing water works is effective or otherwise, but whether the statute providing for the agency also contains provisions assisting it to impair or destroy the property of the private corporation by other means than competition.

We are thus brought to an examination of the statutes, and our first inquiry will be whether they merely threaten parties in the plaintiff's situation with the consequences of local municipal competition, or constitute an invasion of their grants. The former, as we have seen, is permissible. But the latter may be done; for the doctrine has been settled since the *Dartmouth College Case* (4 Wheat. 518), that a grant of corporate powers by the sovereign to an association of individuals for public use, constitutes a contract within the meaning of the Federal Constitution prohibiting a state legislature from passing laws impairing its obligations. In the recent case of *Pearsall* v. *Great Northern Ry. Co.* (161 U. S. 646), the court, after a brief review of the *Dartmouth College* case, said: "Subsequent cases have settled the law that wherever charter rights have been acquired by virtue of the corporate charter, such rights, so far as they are necessary to the full and complete enjoyment of the main object of the grant, are contracts, and beyond the reach of destructive legislation" Intermediate the cases cited there are many cases in the Supreme Court of the United States in which the doctrine referred to has been either asserted or made the basis for the decision, as in *No. Gas Co.* v. *La. Light Co.* (115 U. S. 650); *No. Water Co.* v. *Rivers* (115 U. S. 674); *Louisville Gas Co.* v. *Citizens Gas Co.* 115 U. S. 683). These were cases where the grants were of an exclusive right to supply gas or water to a municipality. That court has taken frequent occasion to assert the inviolability of corporate charters in cases respecting the power of taxation, and in a series of decisions extending over many years has held that a clause in the contract imposing certain taxes in lieu of other taxes, or all taxes to which the stockholders would be subject, is impaired by legislation raising the rate of taxation or imposing taxes other than those specified in the charter. (*N. J.* v. *Wilson*, 7 Cranch, 764; *State Bank of Ohio* v. *Knoop*, 16 How. [U. S.] 369; *Dodge* v. *Woolsey*, 18 How. [U. S.] 331; *McGee* v. *Mathis*, 4 Wall. 143; *Farrington* v. *Tenn.*, 95 U. S. 69; *Asylum* v. *New Orleans*, 105 U. S. 362.)

[In *People* v. *O'Brien* (111 N. Y. 1), the court at page 51 said: "An express reservation by the legislature of power to take away or destroy property lawfully acquired or created would necessarily violate the fundamental law, and it is equally clear that any legislation which authorizes such a result to be accomplished indirectly, would be equally ineffectual and void." That this contract is protected by the Constitution from destruction or impairment by legislation intended to accomplish that result either directly or indirectly, is established by the authorities to which reference has been made.

Whether the plaintiff's contract is impaired by the legislation under which the defendant has established its water works, will now be considered.

We have already said that such legislation was not in excess of the power of the legislature in so far as it granted to the villages of the State the right to construct and

operate water works, notwithstanding the existence in such villages of a private corporation engaged in the same business, which obtained its franchise under the act of 1873. But the appellant contends that chapter 181 of the laws of 1875 and the acts amendatory thereof and supplemental thereto, under which the defendant has proceeded to construct water works of its own, authorizes the village, as its competitor, to tax the plaintiff company in the event that the net water receipts are not sufficient to pay interest and principal as they become due. Thus it may be compelled to contribute towards the cost of the construction and maintenance of the water works of its competitor, and, in addition a system of water taxes is devised by which taxpayers who are customers of the plaintiff corporation may be discriminated against and thus compelled through self-interest to cease taking water from the plaintiff and take that of the defendant instead. Section 16 of the act provides: "In case the entire annual receipts for water rents, after deducting as in the preceding section provided, shall, in any year, not be sufficient to pay the interest for that year on said loans, or in case in any year when any of the principal of the loan secured by said bonds falls due, the amount of said receipts for water rents, after making said reduction, together with the sum in the said sinking fund, shall not be sufficient to pay said principal, * * *" shall "cause such deficiency to be assessed, levied and collected from the taxable property of said village * * *." By chapter 507 of the Laws of 1889 authority was conferred upon the boards of water commissioners, acting under chapter 181 of the Laws of 1875, to establish a scale of water rates for the use of water, also rates to be assessed upon all real property abutting on the streets where the water pipes are laid. This section was amended by chapter 662 of the Laws of 1893, so as to authorize boards of water commissioners to "establish a scale of rates for the use of water and also rates for fire protection to be assessed on all real property abutting on the mains or within two hundred feet of the hydrants, the owners or occupants of which do not use the water for domestic or manufacturing purposes." By chapter 284 of the Laws of 1894 it was further amended, so as to read as follows: "Boards of water commissioners * * * may establish a scale of rates for the use of water and also rates for fire protection, to be assessed on all real property abutting on the mains or within two hundred feet of the hydrants, or on such real property so abutting, or within such distance, as such boards may deem beneficial, upon which real property the water is not used by the owners or occupants thereof for domestic or manufacturing purposes."

It is difficult to conceive of a more ingenious and effective device to deprive the plaintiff of its customers than the provision of the statute which we have just quoted, The development of the law upon that subject is interesting, but we shall not stop to discuss it, as the provisions we have quoted seem to make their own comment.

The provision of the act of 1894 had become incorporated into the act of 1875, before this defendant organized and proceeded in the construction of its works under the latter act. By it we perceive the water commissioners are authorized to "establish a scale of rates for the use of water, and also rates for fire protection, to be assessed upon all real property abutting on the mains or within two hundred feet of the hydrants," or the commissioners may ignore such limitations altogether and create others which may, if they so determine, coincide with the corporate limits, and further they may confine the assessment to real property upon which the water is not used by the owners or occupants thereof for domestic or manufacturing purposes; for the statute provides as an alternative or a substitute for an assessment on all real property abutting on the mains or within two hundred feet of the hydrants, that an assessment may be made "on such real property so abutting or within such distance as such boards may deem beneficial, upon which real property the water is not used by the

owners or occupants thereof for domestic or manufacturing purposes." Who can doubt that a board of water commissioners that would refuse to take such a plant as the plaintiff's by proceedings *in invitum*, and thereby necessarily at its fair valuation, would not hesitate to make use of the discretion so broadly conferred, in order to secure all of the patrons of the private company, or that they would find it at all difficult to determine that it would be "beneficial" to assess a large part of the cost of fire protection upon the inhabitants who had opposed their plan as destructive of property and wasteful, and had continued to take water from the private corporation as a matter of principle? And, again, who can doubt that the villagers would expect to be discriminated against should they refuse the request of canvassers to become customers of the board of water commissioners? An attempt to exercise the authority sought to be conferred by this provision of the statute would necessarily deprive a private corporation of all its customers, and, as a result, the business of such corporation would be absolutely destroyed, a business which the law assured it at the time of its incorporation should not be interfered with otherwise than by competition.

If the provisions of the statute authorizing the taxation of the plaintiff for the payment of the obligations incurred in the construction of the defendant's water works, and the provision authorizing a discriminating tax against its patrons are so connected with the purpose of the act and the object in view that it cannot be said that they do not constitute an essential part of the scheme of the act, then it should be held to be in contravention of section 10 of the Federal Constitution and void. It is, however, a well-settled principle of construction that where the void provisions are separable from those that are lawful, and those that remain are capable of being executed, the valid provisions will not be condemned because of the unconstitutionality of other provisions not absolutely essential to the main purpose of the act. (*Matter of N. Y. & L. I. Bridge Co.*, 148 N. Y. 540, 554, and cases cited.) It is obvious that the offending provisions do not constitute essential feature of the act of 1875, as amended. Indeed, the discriminating feature of the act of 1894 did not become incorporated into the original act until nearly nineteen years after its passage, and the elimination of that feature of the statute will in nowise interfere with the just and proper working out of the general purposes of the act, which is to enable municipalities to provide for an independent system of water works, to be owned and controlled by the municipal authorities. Neither is it an essential part of the scheme that the plaintiff's property should be taxed to pay for the construction and maintenance of the defendant's water works. Abundant resources are provided for the working out of the plan for paying for the property and the cost of its operation, without assessing the property of the plaintiff for such purposes, and we are of the opinion that in view of the public interests involved (for many municipalities have constructed independent water works under this statute) the rule should be invoked which authorizes the elimination of the provisions of a statute which, if allowed to remain, would condemn it, where it can be done without interference with the general plan and scope of the act.

The judgment should be affirmed, with costs.

All concur with Parker, Ch. J., for affirmance, except Bartlett, J., who reads dissenting opinion, and Haight, J., not voting.

Judgment affirmed.

BOOK REVIEWS.

MUNICIPAL POLITICS.

Practical Agitation. By JOHN JAY CHAPMAN. New York, Charles Scribner's Sons, 1900. 12mo, 157 pp. Cloth, $1.25.

The despair of reform is lack of co-operation among reformers. Men who follow politics as a profession and apply it to the ordinary principles of self-seeking business have comparatively little difficulty about getting together; for this is an era of great business combinations. But reform lacks the motive force that makes men go directly to the accomplishment of their ends. However paradoxical it may seem, selfish interests—so presumably individualistic—drive men into co-operation. For the attainment of certain generally esteemed ends, such as great wealth and political "success," co-operation and organization become more and more necessary. How is altruism, with its lack of cohesive power, to meet the forces of selfishness? The practical answer given by many civic reformers is, "By imitating the tactics of the enemy." There is a notion current among reformers that they do not lose their character and, therefore, their reason for existence, by "fighting the devil with his own weapons." It is against this notion that Mr. Chapman's book is a protest. His main idea is, in his own words, "that we can always do more for mankind by following the good in a straight line than by making concessions to evil."

It is plain that if the ends of altruism are the same as those of selfishness, success may in both cases require the use of the same methods. But our author asserts in new and stirring phrase that the end of all reform is to do away with evil practices and that the one means of attaining this end is by the infusion of virtue into private character. It is therefore useless to pursue reform by compromising in the slightest degree with corruption. By so doing, men who were virtuous, having become knaves may get office, but the banner of reform is dragged in the mud, and the sum of virtue in the world is diminished. The only practical agitation is that of the man who sets up a true standard and does not budge an inch from it for the sake of support. There is no policy so futile as that of attempting to buoy up reform movements with influential names. "Influence" is a load that no reform movement can carry. "The party offers a gift to every adherent. You must offer him nothing but labor. That is your protection against traitors."

Mr. Chapman believes intensely in independent political movements, and the men who took a leading part in the Citizens' Union of 1897 would do well to read his book. He has no respect for the idea that an independent vote is thrown away, any more than a virtuous deed in private life ever comes to naught. But reform means fighting. It is impossible to isolate politics and keep the fight out of business and social relations. "The identity between public and private life reveals itself the instant a man adopts the plan of indiscriminate truth-telling." "The first discovery that we make is that the worst enemy of good government is not our ignorant foreign voter, but our educated domestic railroad president, our prominent business man, our leading lawyer. If there

is any truth in the optimistic belief that our standards are now going up, we shall soon see proofs of it in our homes. We shall not note our increase of virtue so much by seeing more crooks in Sing Sing, as by seeing fewer of them in the drawing-room. You can acquire more knowledge of American politics by attacking, in open talk, a political lawyer of social standing, than you can in a year's study." "People who love soft methods and hate iniquity forget this,—that reform exists in taking a bone from a dog." "If you are not strong enough to face the issue in private life, do not dream that you can do anything for public affairs. This, of course, means fight, not to-morrow, but now."

Practical Agitation appeals to the conscience of the citizen. It insists upon integrity,—that ideals must and can be done. Once, indeed, the author seems to strike a false note. He says, "It is only because our standards have been going up faster than the reforms came in that we believe the evils are growing worse." As a matter of fact this whole book is written to show that a divergence between practice and ideal is the root of all evil. Now if it is true that our standards have advanced faster than our practice, we are morally degenerating, our insincerity is increasing. This might be brought about in one of two ways. Through the influence of dreamers, we may be led to admit impracticable ideals; or, through the influence of worldly-wise men, we may be led to treat ideals as impracticable. In either way our integrity is lost. Mr. Chapman addresses himself to the second alternative and says clearly, stirringly, and convincingly that ideals are practicable,—that, in fact, the *only* practical course in political reform is to stick to one's ideals absolutely.

Our author is evidently a disciple of Emerson, and displays much of his master's keenness and vigor. There are, perhaps, some extravagencies in his book, but, for all that, he dives into the heart of things and makes it plain that the *power* of the individual, even in political affairs, is limited only by his *character*. Hence, we need not despair of reform for lack of co-operation. Altruism does not need a *machine* for its self-expression. Let a man walk uprightly and courageously, and all the powers of the universe will work through him.

Elk Rapids, Mich. DELOS F. WILCOX.

CITY PROBLEMS.

Municipal Government. By BIRD S. COLER. New York, D. Appleton & Co., 1900. 12mo, 200 pp. $1.00.

Comptroller Coler of Greater New York has given us within the brief compass of this volume an intelligent and common-sense discussion of some of the more important problems of municipal administration from the standpoint of an official bent upon doing his whole duty and desirous of promoting the welfare of his constituents. Without rhetorical or partisan appeals he takes up and considers the questions of amendments to the Greater New York charter, public charity, the water supply, municipal income and expenses, and transportation, and makes a number of valuable suggestions worthy of careful attention.

Mr. Coler's career has been a remarkable one. Since he assumed office two years ago, he has gained a reputation as a competent and progressive municipal official, second to none other in the country. Elected by the aid of a party organization, the synomyn of practical, corrupt politics, he has steadfastly refused to countenance any plan or scheme not intended for the good of the community. As a consequence he has been in constant opposition to his colleagues elected at the same time and to the organization, but he has saved the city from innumerable jobs and blocked more than one far-reaching scheme of public plunder. He has also placed his office on a business basis and has succeeded in

accomplishing what at the outset seemed little short of impossible—the practical consolidation of the financial accounts of the numerous municipalities, boroughs and counties now constituting Greater New York.

Perhaps the most valuable part of Mr. Coler's volume is that which deals with the needed amendments to the present charter. He believes that the present borough lines and borough offices must be obliterated and that the power of the mayor must be still further increased; that there must be no possibility of evading responsibility, as now, when there is so much division of power and responsibility. He also believes that the power of the comptroller should also be increased "so that no claim, not founded in express contract, should be paid, no bonds issued for any purpose and no appropriation authorized without his approval." This has partially been accomplished through recent legislation, thanks to his personal efforts and the co-operation of Governor Roosevelt. I cannot agree with the suggestion that the corporation counsel should be elected by the people nor that the board of estimate should be clothed with additional powers in the manner outlined. We have now too many elective offices, and the effort should be to reduce rather than increase the number. The mayor is better able to judge of the qualifications of a lawyer to represent the city's legal interests than the half million of voters of a great city. I sympathize with Mr. Coler's desire to reorganize the municipal legislature, but not with his remedy. There should be but a single chamber of limited size, composed of members elected either from the entire city or groups elected from large districts; but the board of estimate as now composed, or as proposed by Mr. Coler, cannot take the place of a municipal legislature; nor should it. The function of one is administration; of the other, legislation.

The two chapters on "Public Charity" are specially timely and helpful. He places his finger on the weak spots of the present system, and makes valuable suggestions for the rectification of the many abuses which have crept in through the negligence or complaisance of careless representatives. His strictures upon the large salary and expense accounts are forcibly put, although I do not think that the figures he quotes from the 1898 report of the Children's Aid Society support his conclusions. While it is true that out of a total of $309,894.79, $106,856.75 are spent for salaries, the great bulk of this latter amount is for the salaries of teachers, an essential feature of the work of the society.

The comptroller has already introduced many reforms in this department of the city's activities and these he recounts in an interesting, but entirely modest way. In fact one of the best features of this little book is the modesty with which the author describes the really important municipal reforms he has inaugurated or has under consideration. The book is free from bombast or self-assertiveness and impresses the reader at once as a sincere effort to find out what is best for the city and the best way of accomplishing it.

In the chapter on "Income and Expenses" Mr. Coler distinguishes between two classes of public improvements. 1st. Those which bring in no direct financial return. 2d. Those "which either result in casting no burdens whatever upon the taxpayers or else bring in an actual profit to the municipality." This distinction is in accordance with sound public policy and the most advanced thought on the subject. Mr. Coler follows this thought to its logical conclusion and strongly recommends that the debts incurred for the latter shall not be regarded as coming within the constitutional limitations placed upon municipal indebtedness.

The chapter on "Water Supply" deals with the fight against the Ramapo water job and the one on "Transportation" takes up the relative cost and value of bridges and tunnels as means of communication between the several parts of the city. Mr

Coler favors tunnels and marshals his arguments to that end. Other chapters deal with "City Development," "The Church in Politics" and "Political Machines."

The book is readable, practical, useful. Municipal reformers and administrators generally will find in it much to aid and stimulate them.

Philadelphia. CLINTON ROGERS WOODRUFF.

ELECTRIC LIGHTING IN BALTIMORE.

Preliminary Report of the Municipal Lighting Commission of the City of Baltimore. JACOB H. HOLLANDER, CHARLES E. PHELPS, JR., EDWIN G. BAETZER. BALTIMORE, 1900.

The resolution by which the commission was created directs it, in advance of its principal report as to the expediency of establishing a municipal lighting plant, to make a preliminary inquiry and report with reference to :—

1st. The price paid for electric and gas lighting by cities having a population equal to or greater than that of Baltimore.

2nd. The existing system of lighting in the City of Baltimore, and the best method of effecting an immediate reduction in cost by other means than the establishment of a municipal lighting plant.

It is clearly stated that this preliminary report "*is not intended* to express any opinion of the Commission as to the expediency of establishing a municipal lighting plant." This disclaimer is quite necessary in view of the fact that the Commission closes its report with a recommendation, and a draft of an act to be submitted to the Legislature to carry the recommendation into effect, that the City of Baltimore procure authority "to issue stock (city bonds) to the amount of $1,350,000, to provide funds for the erection of a municipal lighting plant so that in the event of its determination to erect a plant the delay of two years will be avoided." This has reference to an electric lighting plant only.

The statistical part of the Commission's report is exceptionally well done. The results of its investigations are given in a series of seven tables giving data as to gas, electric and oil lighting. One table (No. III) is devoted to a statistical history of street lighting charges in Baltimore from 1881 to 1899, a period of 18 years. The first

CHARACTER OF LIGHTS.	1882	1899
Number Gas Lights	4,847	6,282
" 2,000 C. P. Electric Lights	225	1,391
" Oil Lights	1,033	1,085
Total Cost per Gas Light per Year	$39.58	$31.60
" " " 2,000 C. P. Electric Light per Year	255.50	127.75
" " " Oil Light per Year	28.87	21.82
Total Cost of Gas Lighting	$200,264.55	$207,287.17
" " " Electric Lighting	21,959.95	175,098.95
" " " Oil Lighting	21,804.99	18,871.25

lesson to be learned is the moderate increase in the number of gas lights, the enormous increase in the number of electric lights, and the almost stationary number of oil lights. The comparison of cost per light shows a decrease of 20 per cent in the cost of gas lights, 50 per cent in electric lights, and 26 per cent in oil lights. There is only

$7,022.62 increase in the total cost of gas lighting, while there is an increase of $158,139.00 in the total cost of electric lighting and a decrease of $7,933.74 in the total cost of oil lighting. This large increase in the total cost of electric lighting is entirely due to the enormous increase in the use of electric lights, not to the cost per light. Use has increased 445 per cent and price has decreased 50 per cent. The fact, however, that the great increase in the cost of public lighting is found in the item of electric lighting, centers attention upon that system and directs to it efforts to reduce cost.

Baltimore leads progress in the art of street lighting. Its first arc lamps were installed in 1882. It is now setting an equally striking example in adopting the Welsbach burners for its gas lighting system. This it has done to the entire exclusion of ordinary gas burners. Its 6,282 gas lights are all Welsbach burners. But two other cities having a population of over 100,000 have made a complete change of gas burners, by discarding ordinary and adopting Welsbach burners. These cities are Omaha, Nebraska, with 909 gas lights, and Worcester, Mass., with 402.

In comparing relative price paid, all factors of differences in methods of charging and service rendered having been computed, Baltimore's position may be indicated by taking its index number, 1,000, in comparison with the cities of Chicago and Cleveland, as given in the tables:

Cities.	Gas.			Electric Light.	
	Hours.	Public Price.	Consumers' Price.	Hours.	Public Price.
Baltimore.....	3,873	1,000	1,000	4,000	1,000
Chicago.....	3,800	695	800	3,850	837
Cleveland.....	3,760	791	640	3,760	726

In an analysis of differences in conditions, it is noted that "in only one city among those considered, Providence, R. I., was there any automatic system of [gas] lamp-lighting in vogue." The high price for electric lighting in New York from $125 to $182.50 per lamp per year is accounted for by the fact that "the connections are through space in conduits leased from a private corporation at a yearly rental of $1,000 per mile of single duct."

The discussion of methods of reducing the cost of public lighting service is replete with sound views, and suggestive as to the methods of procedure. Baltimore is not embarrassed because of existing contracts. Thus four courses are open: 1st. Competition. At present the Consolidated Gas Company and the United Electric Light and Power Company have a monopoly of their respective business. The Commission believes that open competition can eventually have no other effect than to increase the price. A temporary reduction may be made, but consolidation and an increase in the price to compensate for capital uselessly invested and money lost in the brief period of competition will eventually follow. However, existing companies should not be left to fix the rates as they wish. But if grants to new companies become necessary, they should be made only on such terms as will insure to the city a fair return, not only for the present, but also for its future value. A reservation to the city of a share of the gross profits with a further provision for a limitation of the maximum profit are suggested.

2nd. Contracts for a reasonable period with existing companies. The present short terms of the contracts make the rates higher than they ought to be.

3rd. Reduction of price by legislation. The power of the Legislature for this purpose is ample, the only limitation being that the rate fixed must be sufficient to enable the company to earn its operating expenses and a reasonable rate of profit, which is to be determined with reference to the *value* of the company's plant, exclusive of any franchise value.

However, attempts at regulation by the Legislature are usually ineffectual. The books and affairs of the company are private; the information necessary to judge of the fairness of the rate charged can be obtained even from the company's own records only by experts and after very considerable study and investigation. Further; regulation, to be effective, must provide not only for regulation of price, but for the character and kind of service; and must extend to matters of detail. Questions of this character the Legislature is not qualified to determine with justice either to the public or to the companies involved. The power to regulate should be vested in a body of public officials, with full powers of investigation and supervision.

4th. The establishment of a municipal plant. The Commission has not yet completed the investigation necessary to enable it to reach a conclusion as to the advisability of the establishment of a municipal electric lighting plant.

We wish to direct attention to one fallacy in this report. The argument in favor of making a lower price to the city than to private consumers, because the city is a wholesale buyer, is unsound. The city represents a class—taxpayers. The individual represents a class—private consumers. Sales to private consumers are greater than to the city. If either is a wholesale buyer, it is the private consumer. The correct proposition is that the price of the service, in both cases, should be based on cost plus a reasonable profit. When this is done neither class of consumers will be permitted to gain an advantage at the expense of the other.

The suggestions made that, although competition is a failure as a price reducer, it may be necessary in the event of a failure to secure regulation by legislation or to erect a municipal plant, to again resort to competition "to secure reductions in price or improvements in character of service" is unwise. The possibilities of securing these desired objects will not be exhausted until the city has been authorized to and has made the gas and electric lighting companies an offer of a contract on the sound business basis that the city will lease to them the right to perform the service on condition that the city council shall fix the prices to be charged to public and private users during a period of years, on the basis of cost plus a profit limited as specified in the contract; and in case a surplus is created, that it shall be divided equally between the city and the contracting corporations.

The power to make a contract on the terms indicated is better than the power to own and operate. By this means all the benefits of a monopoly can be gained with immunity from its evils. All advantages of long term contracts can be obtained, with a divisible share of the profits derived from improvements in the arts, growth of population and other favoring economic conditions, occurring during the period for which prices are fixed. In making a contract of this kind the valuation of the plants should be arrived at in the same way it would be if the city were to buy them at private sale, or should secure them under proceedings as regulated by law for acquiring private property for public use. This adjustment once made will settle for all time the vexatious questions of competition, short term contracts, flat prices fixed by legislation, watered stocks and bonds, and municipal ownership.

Under the contract indicated, prices to public and private consumers will be as low as they can be made under public or private ownership or operation. A private corporation cannot be compelled to render a service at a price less than cost plus a

reasonable profit. The service cannot be produced by municipal ownership and operation at a figure less than a price so determined.

Columbus, Ohio. ALLEN RIPLEY FOOTE.

A MUNICIPAL PROGRAM.

A Municipal Program. New York, published for the National Municipal League by the Macmillan Company, 1900. 8vo, 246 pp. Cloth, $1.00.

The Municipal Program, prepared by a committee of the National Municipal League, composed of Horace E. Deming, Chairman, Frank J. Goodnow and Albert Shaw of New York, Charles Richardson, Leo S. Rowe and Clinton Rogers Woodruff of Philadelphia, and George W. Guthrie of Pittsburg, has already been published, together with a number of papers explaining and defending it, in the report of the Indianapolis Conference of the League. In the volume now before us, the Program and the original papers in its support, supplemented by six new essays, are published separately. The exclusion of extraneous matter contained in the report of the Indianapolis Conference, the excellent arrangement of the various essays and a thorough index make the work of the committee in its present form much more easily accessible and valuable to the general reader.

The recommendations of the committee making up the Municipal Program are embodied in a constitutional amendment consisting of five articles, and the draft of an extended Municipal Corporations Act. To summarize briefly the principal reforms proposed:

Municipal Home Rule is to be established. Legislative interference is guarded against (1) by a grant of powers liberal enough to enable a municipality to do anything not inconsistent with the general laws of the state, (2) by the provision that cities having a population of 25,000 or over may frame their own charters, and (3) by the requirement of a two-thirds vote of the legislature for the passage of municipal bills which are not made applicable to all the cities of the state, or all the inhabitants thereof. With regard to the general plan of municipal organization, an attempt is made to separate administrative from legislative functions. To guard against spoils politics, fixed terms of office for all except elective officials are abolished, and the mayor is given full power of appointment and removal to all administrative positions except the head of the finance department, subject, however, to a thoroughgoing civil service system applying to all subordinate administrative offices, and the further requirement that no administrative official may be dismissed except for cause duly stated. A limit to city indebtedness is retained but debts incurred in acquiring profitable municipal assets are not to be included in estimating the city's position with reference to the limit established. Set free from financial restraints in this way, the municipality is left to decide its own policy regarding public service works. The legislature is deprived of the power to grant municipal franchises to private parties. Such franchises require a four-fifths vote of the council and the approval of the mayor, and are limited to a term of not exceeding twenty-one years. All grantees of franchises are obliged to make detailed quarterly accounts to the financial department of the city, thus ensuring complete publicity. If at the expiration of a franchise the municipality decides to take over the property, the value of the franchise is not to be included in whatever compensation the grantees may be allowed. Personal registration, a secret ballot, separate municipal elections, and nomination by petition are provided for by the Program, while direct legislation and any form of proportional or minority representation may be established in a city if adopted at a referendum. A single-chambered continuous council is established whose members shall serve for six years, one-third

being elected on a general ticket from the city at large every two years. Cities with a population of 25,000 or over, which have the right to frame their own charters, may, however, adopt the district plan or a combination of district and general representation. Not only general council meetings but all meetings of council committees must be public. The mayor serves only two years and is elected at the same time as the members of the council. In him is concentrated the administrative power of the city. The mayor and the heads of departments may attend council meetings and participate in the proceedings, but may not vote. When specifically requested by the council to do so, they must appear before that body and answer questions. The mayor retains his veto power and has the right to draw up the annual budget. The council may reduce or omit any item of the budget, but has no power to increase it in any way. The number and organization of the administrative departments is left to the council, the appointment and removal of their heads to the mayor, but an exception is made in the case of the head of the finance department, who is elected and may be removed by the council. Administrative supervision of municipal accounts by the chief fiscal officer of the state is provided for, and a uniform, simple and thorough system of municipal book keeping is outlined. The Program also provides generally for the supervision by state officials of other than the financial affairs of cities (p. 201).

From the foregoing some conception may be obtained of the thoroughness, one might even add boldness, with which the committee has attacked the problem of municipal government in the United States. Changes of such magnitude are proposed that it will necessarily be years, possibly decades, before the public can be educated to demand them or the legislature to grant them. Yet there are few students of municipal government who would consider the Program utopian or despair of ultimate success along the lines laid down by the committee. Of the various reforms proposed, some have already been adopted with success in a number of American cities, others are strongly supported by European experience. The public has formed pretty definite opinions on certain questions dealt with by the committee, and more or less successful attempts at reform have already been made. Special legislation is a case in point. Here the committee simply seeks to carry out the popular will by thoroughgoing reforms which shall take the place of earlier and more superficial legislation. Part of the Program may then be expected to meet with little opposition except that arising from inertia. But on the other hand, the committee found itself obliged to take a decided stand on several controversial questions, and to make more than one distinct break with existing conditions and traditions of municipal government in the United States. Here strenuous opposition must be anticipated. It can hardly be maintained, however, that the Municipal Program violates at any point a definitely established American political principle as did the Report of the Tilden Commission, not to mention numerous other drastic municipal reform measures that have been proposed at various times in the United States.

Perhaps no innovation contained in the Program will meet with so much opposition as the attempt to rehabilitate the council. Strongly as the members of the committee have put their case, much experience of a sad sort points in the opposite direction. No hope of an immediate improvement in the character of the council can be held out. Election from the city at large, and the longer term for councilmen may do something; proportional representation, which, however, is not an essential part of the Program, is expected to accomplish much. But in spite of these hopeful features, popular distrust of the council is a force to be reckoned with in practically all the larger municipalities of the country. Perhaps the safeguards which the committee has so carefully thrown around municipal legislation may diminish the strength of this opposition. Beside

retaining the debt limit and requiring an overwhelming majority for the granting of franchises, the Program further provides that "no ordinance or resolution shall be passed finally on the day it is introduced, except in case of public emergency, and then only when requested by the mayor and approved by the affirmative votes of three-fourths of all the members of the council." In the interval thus left between preliminary and final action public opinion would have an opportunity to express itself to the possible prevention of bad legislation. These precautionary measures will also doubtless make the change from a double to a single-chambered council seem less dangerous whenever it has to be undertaken. In this connection, it may not be amiss to remark, without in the least reflecting upon the desirability of a single-chambered council for American cities, that European experience is quoted too sweepingly in favor of the committee's position (p. 61). "At the very outset in England as in all European countries, they have been wise enough to settle that question [whether or not a municipal council should sit as one body or should be divided into two chambers] by general legislation for all municipalities." As against this statement it might be urged that the Prussian system is essentially bi-cameral, and that in the German countries generally, wherever that system has been imitated the *Magistrat* performs legislative functions which make it substantially a second municipal chamber.

Although the members of the committee individually express opinions favorable to municipal ownership (pp. 120 *et seq.*), the Program very wisely aims only at putting the city in a position where it may determine its own policy in such matters. It is, however, questionable whether the amendment to the constitutional debt limit proposed by the committee will accomplish all that is anticipated. In most of our cities public service works are already pretty fully monopolized, and there is a comparatively small margin left for profitable municipal undertakings. Few of the permanent improvements most urgently demanded are of this class. A more thorough and conservative solution of the difficulty than that afforded by setting aside the debt limit might be found by endeavoring to meet the cost of permanent municipal improvements in part at least by taxation.

A curious misconception of the law of monoply price occurs in one of the papers discussing this question (p. 68). "In the very fact of the monopoly character of such business [water supplies, lighting plants, transit lines] it is wholly obvious that the rate can always be made to pay operating expenses and also meet interest and sinking fund charges." As a general statement applying to business of the character described in growing cities this is true enough. But monopoly privileges in themselves do not guarantee success, no matter whether they are controlled by a private corporation or a municipality. Municipal reformers generally have been too vague and sanguine in discussing franchise values, as smaller cities embarking in injudicious ventures might discover to their sorrow. So far as the debt limit is concerned, however, it should be added that the Program defines carefully enough profitable, as distinguished from other municipal undertakings (p. 178).

The fixing of the term of the mayor at two years is contrary to the strong tendency to lengthen it that has been noticeable ever since the concentration of power in the hands of the executive began. If longer terms of office are necessary to enable heads of departments to mature their policies, the same argument would seem to apply with even greater force to the mayor who directs the whole administration of the city. In spite of the intended separation of legislative and administrative functions, the mayor is allowed to retain the veto power—doubtless a concession on the part of the committee to existing conditions.

The provisions of the Program regarding elections will meet with general approval except possibly the following: "The names of all candidates for the same city office

must be printed upon the ballot in alphabetical order under the title of the office." (p. 176.) Were parties immediately to disappear from municipal politics as a result of the committee's reforms, the above provision would be innocuous. But as no such result is to be anticipated, political organizations are bound to protest, and with justice, against this destruction of their personality. Even purely municipal parties, if any should happen to be formed, would take the same position on this question. In a city of considerable size electing its councilmen at large, the nomination of a number of full tickets would result in a ballot which, under this alphabetical arrangement, would be perfectly bewildering to the average voter. It is also difficult to see how proportional representation could be applied under this provision.

To attempt to go into details regarding the Program within the narrow limits of a review article is manifestly impossible. So wide a field has been covered by the committee and so thoroughly has it performed its work that we can at best but indicate its scope and commend it heartily to students of municipal government everywhere. In it legislative committees and reform bodies especially will find a mine of well digested information and argument eminently suited to their needs. The articles in support of the Program are generally admirable and serve well the purpose of elucidating the dry text of the charter and constitutional amendments. No more suitable introduction to the whole work could have been provided than Mr. Fairlie's sketch of municipal development in the United States from colonial times to the present day. It is to be hoped that he will find time later to expand his rich historical materials into a separate volume. Finally, the chief merit of the Municipal Program undoubtedly is that instead of "destructive criticism" it furnishes us "a positive basis for political reorganization" and thus tends to do away with the "growing distrust of the ability of reform movements to meet the practical problems of American political life."

Cornell University. ROBERT C. BROOKS.

NEW YORK HISTORY.

A Brief History of the City of New York. By CHARLES B. TODD. New York, American Book Co., 1899. 12mo, 299 pp. Cloth, 75 cents.

To quote the opening words of the author's preface, "This volume was written at the suggestion of public school teachers and members of the City History Club, as a text book for use in the public and private schools of New York, as well as for all others interested in the study of the city's striking and romantic history."

Such a book, brief, complete and attractive has long been needed and is particularly welcome at this time. Dr. Albert Shaw says we are in the midst of a "Civic Renaissance" and one evidence of the truth of this statement is the interest manifested in the appearance of any book discussing local history and government. Unfortunately, the numerous newspaper and magazine articles, as well as some of the more pretentious works on our city history are often misleading, being full of inaccuracies which become more glaring as they are handed down. Although Mr. Todd claims to have consulted documentary sources and to have endeavored to avoid the mistakes of his contemporaries, the "Brief History of the City of New York" is not without errors. These, however, are not of a very serious character, and the author has succeeded to a greater degree than any who have gone before him in providing a book suitable for the young student of local history.

Following the lines of the larger work, the Dutch period occupies the first fourth of the volume, and is rendered specially interesting by its graphic description of Dutch manners and customs in New Amsterdam. Several illustrations are reproduced from

Valentine's *Manual*. The English period, although in some respects more romantic than the Dutch, is touched on much more lightly, Leisler's Rebellion occupying a prominent place. Separation of the purely historical from the description of manners and customs in New York while under the English flag would have rendered the story more clear and connected, but it is certainly very entertaining. The Revolutionary period is treated more in detail and contains a number of well-told incidents of the New York campaign. The maps and pictures of historic buildings add greatly to the interest. It is to be regretted that the author did not condense the excellent chapter on "Constitution Making" and the story of Hamilton and the Federal Procession from his larger work, inserting this before his discussion of the Federal period. This part of the book consists chiefly of the story of New York's commercial progress and lacks something of historical connection, a want which is not atoned for by "An Old Man's Recollections of New York," for the "recollections" while interesting are not always historically accurate. The chapter entitled "Greater New York" is valuable as a simple summary of the main points of our present city charter. Exception might be taken to some of the statistics quoted at the end of the chapter, but figures have been proved to "lie" in other instances. The chapters on Brooklyn and the Bronx are timely and one wishes there were similar chapters on Queens and Richmond now that they are part of our corporate limits.

As a whole the little book is delightfully refreshing and cannot help carrying out Mr. Todd's purpose to make his young readers take an interest in the affairs of the city and so learn "to guide its destinies aright."

New York City. FRANK BERGEN KELLEY.

ANNUALS FOR 1900.

The Municipal Year Book of the United Kingdom for 1900. By ROBERT DONALD. London, Edward Lloyd, 1900. 12mo, 528 pp. 2s. 6d.

The preceding issues of this annual are well known. The present one is even better than those before published. Interesting chapters upon Municipal Legislation in 1899 and Local Government in Ireland have been added, and all others more or less extended. Mr. Donald deserves the thanks of all English and American citizens, taxpayers and public officials.

New York Charities Directory: A Classified and Descriptive Directory to the Philanthropic, Educational and Religious Resources of the City of New York. (Tenth Edition.) New York, Charity Organization Society, 1900. 12mo, 773 pp., $1.

So widely known is the *Charities Directory*, that it is only necessary to call the attention of our readers to the fact that the tenth volume has just been issued. It contains the important facts regarding some 3,400 philanthropic organizations, societies, asylums, reformatories, missions, hospitals, churches, libraries, mutual benefit associations, etc., etc. It is of invaluable aid to everyone interested in religious, charitable or philanthropic work.

Legislation by States in 1899. By ROBERT H. WHITTEN, Ph.D. Albany, University of the State of N. Y., 1900. 8vo, 395 pp. Paper, 25 cents.

This series, of which the present volume is the tenth, is issued annually and contains a digest of the enormous statutory output of all the legislatures of the United States. The statutes are arranged topically, so that one interested in any law or topic regarding which laws have been passed, can find out what statutes have been enacted and what is their general character. Dr. Whitten is to be congratulated on the success of the present volume and his excellent work as legislative librarian.

BIBLIOGRAPHICAL INDEX.

KEY TO ABBREVIATIONS.

BRITISH AND AMERICAN PERIODICALS.

American Architect, Boston	W	Am. Arch.
American Ecclesiastical Review, New York	M	Am. Ecc. R.
American Economic Association Publications, New York	B-M	Am. Econ. Assoc.
American Electrician, New York	M	Am. Elec.
American Federationist, Washington	M	Am. Fed.
American Gas Light Journal, New York	W	Am. Gas Light J.
American Historical Review, New York	Q	Am. Hist. R.
American Journal of Science, New Haven	Y	Am. J. Sci.
American Journal of Sociology, Chicago	Q	Am. J. Sociol.
American Law Review, St. Louis, Mo	M	Am. Law R
American Monthly Review of Reviews, New York	M	Am. R. of Rs.
American Public Health Association, Concord, N. H	Q	Am. P. H. Assoc.
American Statistical Association Publications, Boston	Q	Am. Statis. Assoc.
Annals of the American Academy of Political and Social Science, Philadelphia	B-M	Ann. Am. Acad Pol. Sci.
Architect, London	W	Arch.
Architectural Record, New York	Q	Arch Rec.
Architectural Review, Boston	B-Q	Arch R.
Architecture and Building, New York	W	Arch. & Buil.
Arena, Boston	M	Arena.
Atlantic Monthly, Boston	M	Atlan.
Banker's Magazine, London	M	Bank. M. (L.)
Banker's Magazine, New York	M	Bank. M. (N. Y.)
Bibliotheca Sacra, Oberlin, O	Q	Bib. Sacra.
Blackwood's Magazine, Edinburgh	M	Blackw.
Board of Trade Journal, London	M	Bd. Trade J.
British Architect, London	W	Br. Arch.
Builder, London	W	Builder.
Bulletin of the Department of Labor, Washington	B-M	B. Dept. Labor.
Canadian Architect, Toronto	M	Can. Arch.
Canadian Electrical News, Toronto	M	Can. Elec. N.
Canadian Engineer, Montreal	M	Can. Eng.
Canadian Magazine, Toronto	M	Canadian M.
Cassell's Family Magazine, London	M	Cassell's.
Cassier's Magazine, New York	M	Cassier's.
Century, New York	M	Cent.
Chamber's Journal, Edinburgh	M	Chamber's.
Charities Review, New York	M	Char. R.
Charity Organization Review, London	M	Char. Or. R.
Chautauquan, Meadville, Pa	M	Chaut.
City and State, Philadelphia	W	City & State.
City Government, New York	M	City Govt.
City Record, Boston	W	City Rec.
Commons, The, Chicago	M	Commons.
Commonwealth, New York	W	Commonw.
Consular Reports, Washington	M	Cons. Rep.
Contemporary Review, London	M	Contemp.
Cornhill Magazine, London	M	Cornhill.
Cosmopolitan, New York	M	Cosmopol.
Dial, Chicago	S-W	Dial.
Direct Legislation Record, Newark, N. J	M	Dir. Leg. Rec.
Dublin Review, London	Q	Dub. R.
Eclectic Magazine, New York	M	Ecl. M.
Economic Journal, London	Q	Econ. J.
Economic Review, London	M	Econ. R.
Economist, Chicago	W	Economist.
Edinburgh Review, Edinburgh	Q	Ed. R.
Education, Boston	M	Educa.
Educational Review, London	M	Educa. R. (London.)
Educational Review, New York	M	Educa. R. (N. Y.)
Electrical Engineer, London	W	Elec. Eng. (L.)
Electrical Engineering, Chicago	M	Elec. Engng.
Electrical Review, New York	W	Elec. R.
Electrical World and Electrical Engineer, New York	W	Elec. W. & E.
Electrician, London	W	Elec'n.
Electricity, London	W	Elec'y (L.)
Engineer, The, London	W	Eng.

Engineering, London	W	Engng.
Engineering Magazine, New York	M	Engng. M.
Engineering News, New York	W	Engng. N.
Engineering Record, New York	W	Engng. Rec.
English Historical Review, London	Q	Eng. Hist. R.
Fire and Water, New York	W	Fire & W.
Fortnightly Review, London	M	Fortn.
Forum, New York	M	Forum.
Gas World, London	W	Gas W.
Green Bag, Boston	M	Green B.
Gunton's Magazine, New York	M	Gunton's.
Harper's Magazine, New York	M	Harper's M.
Harper's Weekly, New York	W	Hrprs. Wkly.
Illinois Society of Engineers and Surveyors, Peoria		Ill. Soc. Eng.
Independent, New York	M	Ind.
Indian and Eastern Engineer, Calcutta	W	Ind. & East. Eng.
Indian Engineering, Calcutta	W	Ind. Engng.
International Review, New York	M	Internat. R.
Johns Hopkins University Studies in History, etc., Baltimore.		J. H. Univ. Studies.
Journal of the Association of Engineering Societies, Philadelphia.	M	J. Assoc. Engng. Soc.
Journal of the Department of Labor, Wellington, New Zealand	M	J. Dept. Labor.
Journal of Finance, London	M	J. Finance.
Journal of the Franklin Institute, Philadelphia	M	J. Frankl. Inst.
Journal of Gas Lighting, London	W	J. Gas Light.
Journal of the New England Water-Works Ass'n, New London, Conn.	Q	J. N. E. W. W. Assoc.
Journal of Political Economy, Chicago	Q	J. P. E.
Journal of the Royal Statistical Society, London	Q	J. R. Stat. Soc.
Journal of the Sanitary Institute	M	J. San. Inst.
Journal of Social Science, Boston	Y	J. Soc. Sci.
Journal of the Society of Arts, London	W	J. Soc. Arts.
Journal of the Society of Comparative Legislation, London	Q	J. Soc. Comp. Leg.
Journal of the Western Society of Engineers, Chicago	B-M	J. W. Soc. Eng.
Kindergarten Magazine, Chicago	M	Kindergarten M.
Labor Bulletin of the Commonwealth of Massachusetts, Boston.	Q	Labor Bulletin, Mass.
Law Magazine and Review, London	M	Law M. & R.
Leslie's Weekly, New York	W	Leslie's Wkly.
Library Journal, New York	M	Lib. J.
Lippincott's Magazine, Philadelphia	M	Lippinc.
Literary Digest, New York	W	Lit. Dig.
Longman's Magazine, London	M	Longm.
Macmillan's Magazine, London	M	Macmil.
McClure's Magazine, New York	M	McClure's.
Merchant's Association Review, San Francisco, Cal.	M	Mchts. Assoc. R.
Municipal Engineering, Indianapolis, Indiana	M	Mun. Engng.
Municipal Journal and London, London	W	Mun. J. & London.
Municipal and Railway Record, New York	M	Mun. & Ry. Rec.
Municipal World, St. Thomas, Ont.	M	Mun World.
Munsey's Magazine, New York	M	Munsey's.
Nation, New York	W	Nation.
National Review, London	M	National R.
New Century Review, London	M	New Cent. R.
New England Magazine, Boston	M	New Eng. M.
New Review, London	M	New R.
New York Education, Albany	M	N. Y. Educa.
Nineteenth Century, London	M	19th Cent.
North American Review, New York	M	No. Am.
Open Church, New York	Q	Open Church.
Open Court, Chicago	M	Open Court.
Our Country, New York	M	Our Country.
Our Day, Boston	M	Our Day.
Outlook, New York	W	Outlook.
Overland Monthly, San Francisco, Cal.	M	Overland.
Park and Cemetery, Chicago	W	Park & Cem.
Political Science Quarterly, New York	Q	Pol. Sci. Q.
Popular Science Monthly, New York	M	Pop. Sci. Mo.
Proceedings of the Engineers' Club, Philadelphia	Q	Pro. Eng. C.
Progressive Age, New York	W	Prog. Age.
Public Opinion, New York	W	Pub. Opin.
Publications of the Southern Historical Association, Washington.		Pub. So. Hist. Ass'n.
Quarterly Journal of Economics, Cambridge, Mass.	Q	Q. J. E.
Quarterly Review, London	Q	Quar. R.
Railroad Gazette, New York	W	Railroad Gaz.
Railway World, London	M	Ry. World.
Real Estate Record and Guide, New York	W	Real Estate Rec. & G.
Review of Reviews, London	M	R. of Rs. (Eng.)
Sanitarian, Brooklyn	M	Sanitarian.
Sanitary Journal, Glasgow	M	San. J.
Sanitary Record, London	W	San. Rec.
Saturday Review, London	W	Sat. R.
Scientific American, New York	W	Sci. Am.
Scientific American Supplement, New York	W	Sci. Am Sup.
Scottish Review, London	Q	Scottish R.

Scribner's Magazine, New York....M	Scribner's.
Self-Culture, Akron, Ohio....M	Self-Cult.
Spectator, London....W	Spec.
Strand Magazine, London....M	Strand.
Street Railway Journal, New York....M	St. Ry. J.
Street Railway Review, Chicago....M	St. Ry. R.
Transactions of the American Institute of Electrical Engineers, New York....M	Trans. Am. Inst. Elec. Eng.
Transactions of the American Society of Civil Engineers, New York....M	Trans. Am. Soc. Civ. Engrs.
Westminster Review London....M	W-stm.
Yale Review, New Haven, Conn....Q	Yale R.

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Allgemeines Statistisches Archiv, Tübingen....S-Y	All. Stat. Ar.
Annales D'Hygiene Publique, Paris....M	Ann. D'Hyg. Pub.
Annales des Sciences Politiques, Paris....M	Ann. Sci. Pol.
Annales des Travaux Publics de Belgique, Brussels....Bi-M	Ann. Travaux Pub.
Arbeiterfreund, Berlin....Q	Arbeit.
Archiv für Eisenbanwesen, Berlin....B-M	Ar. Eisenbahn.
Archiv für Oeffentliches Recht, Freiberg....Q	Ar. Oef. Rt.
Archiv für Soziale Gesetzgebung und Statistik, Berlin....B-M	Ar. Soz. Gesetz. Stat.
Bibliotheque Universelle, Brussels....M	Bib. Univ.
Deutsche Bauzeitung, Berlin....B-W	Deut. Ban.
Deutsche Revue, Stuttgart....M	Deut. R.
Deutsche Rundschau, Berlin....M	Deut. Rund.
Devenir Social, Paris....M	Dev. Soc.
Elektrotechnische Zeitschrift, Berlin....M	Elek. Zeit.
Espana Moderna, Madrid....M	Esp. Mod.
Finanz-Archiv, Stuttgart....S-Y	Finanz-Ar.
Génie Civil, Paris....W	Génie Civil.
Gesundheits-Ingenieur, Munich....B-W	Gesund.-Ing.
Giornale Degli Economisti, Roma....M	G. Degli Econ.
Historische Vierteljahrschrift, Leipzig....Q	Hist. Vier.
Historische Zeitschrift, Munich and Leipzig....Q	Hist. Zeit.
Historisches Jahrbuch, Munich....Q	Hist. Jr.
Jahrbuch für Gesetzgebung Verwaltung und Volkswirtschaft in Deutschen Reich, Leipzig....Q	Jr. Gesetz. Ver. Volks.
Jahrbücher für Nationalokonomie und Statistik, Jena....Q	Jr. Nat. Stat.
Journal des Economistes, Paris....M	J. Economistes.
Nouvelle Revue, Paris....S-M	Nouvelle R.
Nouvelle Revue Historique, Paris....B-M	N. R. Hist.
Nuova Antologia, Rome....S-M	Nuova Ant.
Preussische Jahrbücher, Berlin....M	Preus Jr.
Reforma Sociale, Turin....M	Reforma Soc.
Réforme Sociale, Paris....M	Ref. Soc.
Revue Bleue, Paris....W	R. Bleue.
Revue de Deux Mondes, Paris....S-M	R. Mondes.
Revue de Droit Publique, Paris....B-M	R. Droit Pub.
Revue D'Économie Politique, Paris....M	R. Econ. Pol.
Revue Generale, Brussels....M	R. Gen.
Revue Internationale de Sociologie, Paris....M	R. Int. Sociol.
Revue de Paris, Paris....S-M	R. Paris.
Revue Pédagogique, Paris....M	R. Ped.
Revue Pénitentiaire, Paris....B-M	R. Pen.
Revue Politique et Parliamentaire, Paris....M	R. Pol. e. Par.
Revue des Questions Historiques, Paris....M	R. Ques. Hist.
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(NOTE.—This following subject index is intended to continue the work began in the first (March, 1897) issue of MUNICIPAL AFFAIRS, which was entirely devoted to a Bibliography of Municipal Administration and City Conditions. In subsequent numbers, the Index was made complete to December 1st. So far as possible all books, reports, pamphlets and magazine articles of interest to students of city government which have appeared during the past three months, December, 1899—March, 1900, are included in the following list. Future numbers of MUNICIPAL AFFAIRS will contain similar indices covering the literature of each preceding quarter.)

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BIOGRAPHICAL NOTICES

OF THE

WRITERS IN MUNICIPAL AFFAIRS FOR MARCH, 1900.

ROBERT FULTON CUTTING.—Has been prominently connected with the most important philanthropic and political movements of New York City, having been for many years an active member of the Charity Organization Society, and since their foundation of the Citizens' Union and the City Club. Has contributed to many prominent magazines on sociological questions. Is a member of several of the more important New York Clubs.

JOHN G. AGAR.—Born in New Orleans, January 8, 1856. Graduated from Georgetown University, D. C., with the degree of A. B. in 1876; A. M. in 1886 and Ph. D. in 1888. Studied law at Columbia University, the degree of LL. B. being conferred in 1880. Since that date has practiced law in New York City. Has taken a prominent part in public movements of various sorts and occupied several official positions.

PHILIP FALKENBURG.—Born at the Hague, Holland, in 1868. Educated in the public schools and gymnasium of his native city and graduated as doctor of laws from the University of Leyden in 1890, writing a dissertation on the wages-question. Was tutor in political economy to students preparing for their university examinations. In the years 1892–1897, prepared for the Dutch Society for Political Economy and Statistics reports on poor relief in the cities of Amsterdam, Rotterdam and the Hague. Was appointed in 1893 to a position in the State Department for Public Works, Commerce and Industry (labor legislation division) at the Hague. In 1894 was promoted to director of the municipal bureau of statistics at Amsterdam. His other writings, articles in German and Dutch magazines, in Conrad's Dictionary of Political Science, in weekly papers and gazettes have been on special problems in political economy, city government, labor question and other social matters. Was elected in 1897 member and secretary of the municipal committee for the investigation of the position of Amsterdam laborers in different trades.

J. H. VAN ZANTEN.—Born at Tiel, Holland, in 1874. Educated in public schools and gymnasium of his native city and graduated as doctor in political science at the University of Amsterdam in 1897 upon a dissertation on the methods of poor relief, and as doctor in law at the same University in the same year. Published in 1897 for the Dutch Society of Political Economy and Statistics a report on poor relief at the city of Groningen. Was appointed in 1896 assistant in the Municipal Bureau of Statistics at Amsterdam and was promoted in 1898 as assistant-director. In 1899 was made secretary of the newly-erected representative council of labor for the building trades. Is correspondent of the German economic journal, *Soziale Praxis*.

ROBERT DONALD.—Born in Scotland in 1860. Engaged for many years on daily press in Edinburgh and London, and acted as correspondent in Paris. Spent one year in United States (New York and Washington). Established *London*, "a journal of civic and social progress," eight years ago as an exponent of progressive municipal movement in the Metropolis. This paper did good work in exposing abuses, attacking monopolies and advocating a progressive policy. Its influence soon extended beyond the city from which it took its name, and was re-named *The Municipal Journal*, and its scope widened. Has edited the *Municipal Year Book*, describing work of all municipalities

in Great Britain, and *London Manual*, a citizens' handbook to the Metropolis. Has contributed to reviews on municipal subjects and is chief writer on such matter on English press. Until recently occupied position on London daily journalism. Now occupies business position, but continues editor of *Municipal Journal*, etc.

MILO ROY MALTBIE.—Born near Hinckley, Illinois. Received his early education in the public schools and the preparatory department of Upper Iowa University, graduating from the College in 1892. Spent one year in the graduate school of the Northwestern University, devoting particular attention to municipal government. Was awarded, in 1893, the Dewey prize of $100 in Political and Social Science, and the Cushing prize of $100 in Municipal Government for a dissertation upon *The City Government of Chicago*. From 1893 to 1895 taught higher mathematics and economics in Mount Morris College, Illinois, leaving there to accept the University Fellowship in Administrative Law at Columbia University. Received the degree of Ph. D. from the latter institution in 1897, having given particular attention to administrative law, public law, economics and municipal government. After graduation, was chosen secretary of the Reform Club Committee on Municipal Administration and editor of MUNICIPAL AFFAIRS. Spent the summer of 1899 studying municipal problems and conditions in Europe. Has lectured upon various governmental and municipal topics. Has also written *English Local Government of To-day; Central Administrative Control in England; The English Local Government Board; Municipal Functions; A Study of the Development, Scope and Tendency of Municipal Socialism;* and several papers upon other municipal subjects appearing in various magazines.

JAMES HENRY HAMILTON.—Has received the following degrees: Hanover College, B. S., 1885; University of Cincinnati, LL. B., 1887; Indiana University, A. M., 1893; Wisconsin University, Ph. D., 1896. Studied in Germany 1893–1894. Elected instructor in economics at Syracuse University 1896, and associate professor of economics in 1899. Was summer term lecturer in economics at West Virginia University in 1898 and in 1899. Is author of *Postal Savings Banks vs. Commercial Banks* in the Annals of the American Academy; *Educational Aspects of Saving*, Quarterly Journal of Economics; *Public School Financing*, Journal of Pedagogy; *A Neglected Principle of Civic Reform*, in the American Journal of Sociology, May, 1900; *The Place of the Service Tax in Modern Finance*, to appear in the Journal of Political Economy, June, 1900.

GUSTAVUS MYERS.—Born in 1874 at Trenton, N. J. Educated in the public schools of Philadelphia. Won five annual prizes for proficiency. Later served in a reportorial and editorial capacity on various newspapers and journals in Philadelphia and New York. Began work in 1896 on an original political history of New York City, just completed, but unpublished. Is a member of the Social Reform Club of New York City and has been interested in progressive and economic subjects since an early age.

BIRD S. COLER.—Born about 1870; a descendant of a Nuremburg family. At an early age was made partner in the firm of W. N. Coler & Co., his father being senior partner. Has since made a study of municipal bonds and public franchises. Was elected in 1897 as Comptroller of Greater New York, running upon the Democratic ticket. Since his inauguration has taken an active part in municipal politics, and has invariably stood for honesty, efficiency and public interests. Has introduced many reforms in the finance department, and nearly all of the measures he has presented to the State Legislature have become enacted into law.

JOHN A. BUTLER.—Born in Milwaukee, Wisconsin, in 1851. Received his early education in the schools of that city and Phillip's Exeter Academy, New Hampshire. Subsequently graduated from Yale in 1874, and spent several years at the Universities of Goettingen and Leipsic. He studied law, but practiced only a short time. Has contributed various articles to Harper's and other magazines, and spent many years in foreign travel. On returning from a seven-years' residence in Europe in 1891, became interested in, and was a pioneer in advocating better municipal conditions in American cities. Suggested the formation of The Municipal League of Milwaukee in 1894, and has been elected its presiding officer six successive years. Read a paper before the first National Conference for Better City Government, at Philadelphia, in January, 1894; and has at various times read papers before the annual meetings of the National Municipal League, and is a member of its executive committee.

B. LEIGHTON BEAL.—Born in Boston in 1855. Educated in the public schools of Boston and the Massachusetts Institute of Technology. Was instructor at Massachusetts Institute of Technology in chemistry and mining in 1875 and 1876. From 1877 to 1894, engaged in newspaper work in Boston. Since October, 1894, has been secretary of the Boston Transit Commission.

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MUNICIPAL AFFAIRS.

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ADVERTISING RUN MAD.

BY JOHN DEWITT WARNER.

Switzerland.—The Cantonal Councils of Uri, Grisons, and the Valais have spoken (Oct. 10th) in no uncertain tones. "*We will no more allow*," they say, "*these advertisements on our rocks than on the white cross of our flag.*"

Two items of our civilization have developed until they so crowd each other as to compel attention to the result.

One is that phase of altruism which takes friendly interest in the beauty or grandeur of what is not one's personal possession. Of course this has never been entirely lacking. The prophet saw the starry night as a queen robed in glory, and the rising Sun as a beautiful God. Indeed, men everywhere, as fast as they got beyond barbarism seem to have noted and felt free to admire and enjoy what they considered the property of their Creator.

Until lately, however, the average man has seemed to have little care for or joy in aught belonging to his fellow man. The most cultured nations of antiquity were even more prompt to destroy than to preserve as spoil the very objects that they would have most highly prized if their own. The mediæval baron, lavishly adorning with every resource of wealth and art even those parts of his own property that he rarely saw, was so little interested in the condition of that of others or of the public, that the leading characteristics of his city were the extreme luxury and squalor that characterized it, and the constant juxtaposition of the two. It is hard to realize the state of mind that would permit this. But we know that it was true, and that the noble lords and ladies to whom velvets and perfumes and guarded

quiet or sweet music were necessities at home, must have been little disturbed by the rags and filth, stench and bedlam in or through which they daily walked.

But *Nous avons changé tout cela.* And all men of culture now profess to feel—and a very large proportion of those so professing actually do feel—an interest in the beauty and comfort of the world about, especially of their city, of the streets through which they walk daily, of the conditions under which, outside of their own homes, their life must be so largely spent. It thus happens that, while but few generations since it would not have occurred to most people to criticise the taste, much more to question the right, of a neighbor who made his premises hideous, people in general now admit that each is dependent upon the good taste of others and has duties to them in turn. As a result we have taken two steps in preparation to deal with our subject. "Everybody who is anybody" admits an interest in the extent and manner in which others' property is used. And it is now more and more generally asserted by each that he has somewhat of right in the property of others, and of responsibility to them in the use of his own.

The other latter day development alluded to is the increasing anxiety of the individual to attract public attention, and his unscrupulous ingenuity to secure this. It is not meant here specially to deprecate this anxiety—still less to suggest it as showing our generation to be different at heart from those that have preceded it. It is largely, indeed, a matter of circumstance. In oligarchies, such as in effect were the hamlets, cities and states of old days, the inevitable distinction of the few who dared to claim it left no need for precaution to keep them from becoming lost in the mob. Similarly, the small number and the strong individuality of the merchants, manufacturers or artisans who could for a moment be considered as competing with each other in any locality were such as to make what we now class as advertisements a comparatively trivial matter, and one of taste rather than use. To-day, however—when business competition in every line includes whole countries and frequently the world, and when one's individuality is as lost in the crowd of the well-to-do as ever was that of the peasant in the mob of his fellows—we see combined two of the strongest possible impulses—business policy and personal vanity.

The subject of this paper is the resultant of these two forces.

Ours is a world in which our cities and our rural districts, our most beautiful and striking scenery, and not merely our highways but our byways, things sacred as well as common, have become signboards by which, with every device of color, every possible use of light, one tradesman after another attempts to put others into the background and to force himself and his wares upon our notice. But it is also a world which is daily more and more alive to the interest of each in the decency of all, and to the right of each to be protected against a public nuisance—whether of an old or of a new class, or whatever the sense offended by it.

The subject has been of late too much mooted to need special explanation. It is so far a characteristic of enterprise run mad that no country or city, except in so far as its police or its law may have commenced to deal with the problem, has any special right to criticise others. It so happens, indeed, that Great Britain and America have here gone farthest in depravity; but no one who has seen the atrocities perpetrated by Frenchmen, Germans and Italians—as fast as they have learned to do it from English and Americans—will credit them with any special virtue. Indeed, the advertising curse seems so inseparable from civilization as to measure at once progress of civilization and lack of culture.

EXAMPLES.

Striking examples are too many and too generally distributed to excuse much of detail here, and yet the comparative indifference of each locality to its own sins, and its vivid appreciation of those committed elsewhere, perhaps justifies, indeed prompts, note of a few characteristic specimens, to which each reader can doubtless add from his own observation. In the following I am largely indebted to *A Beautiful World* (the organ of the British Society for Checking the Abuses of Public Advertising).

At more than one fashionable watering place, the indignation of patrons who remain, and the criticism of those who were thereby driven away, have pretty generally convinced beach proprietors that to make their bathing machines, the great sails of their pleasure and fishing sloops, or the beach itself gigantic bill boards for pill and plaster advertisements is the reverse of attractive.

The view from Waterloo Bridge towards Blackfriars, London, has become a gallery of advertising monstrosities—among the first of which is the changing of a gloomy and romantic clock-tower to an advertising stand, compared with the ordinary barber pole is tasteful and modest.

After this, on the Thames embankment, where beautiful gardens were created at great expense, the railway companies were left to turn the scene into one of æsthetic jim-jams by displaying above the green vista a blaze of excursion announcements.

In 1890, an advertising firm erected on Ludgate Hill a sky-sign of such huge dimensions as seriously to mar one of the finest views of the dome of St. Paul's.

"Artists and advertisers seem to be competing for the inner walls of the Royal Exchange [London]. * * * The effect of the seven or eight frescos is considerably marred by the presence of two or three dozen advertisement boards. Imagine the shock at turning from Lord Leighton's work to the advertisement of an insurance company, as any visitor to the Royal Exchange may."—*Daily Chronicle*, Aug. 8, 1899.

Now, we cannot hope to convert the members of our race all in a moment. They will make pills and they will make soap, and they will advertise them even to the furthest corners of the world. I recollect when I was with the British troops in the Soudan desert that some wretch had been found to paint upon a lofty rock an advertisement of one of the most popular soaps of this country. That was his view of the purposes for which the "old Moon mountains African" had been created. —Report of *Scapa* Executive Committee.

"Last summer (1895) I was cruising along the western coast of Sweden. * * * At one place we approached a smooth and vertical wall of rock rising straight out of the sea. It was almost the only unrounded form we saw for days, and had for that reason an exceptional value to the eye. Imagine my horror when, on coming close up to it, I found it painted all over in huge white letters with advertisements of margarine and other products of Gothenberg factories. Such brutalizing of the bays of the Vikings can scarcely be necessary for the maintenance of a wholesome trade."—*Sir Martin Conway.*

In going wherever you like, you will find that the ubiquitous advertiser, with his paint and paste pot, is sure to have been there before you. Along every line of any railway by which you travel out of murky, smoky London, you will find these staring placards on every side, almost by every waterfall, on rustic gates, on cottage fronts where the woodbine and cluster rose should grow. You look out of the railway carriage as you go for your summer excursion to peep at that village spire nestling yonder amongst the trees, and what do you see? Field after field with their glaring announcements of the virtues of some patent medicine. To the greed and selfishness of the modern manufacturer nothing is sacred. * * * * Here is the gallery of God's own painting. Shall we, without protest, suffer the greed of man to deface and defile the masterpieces of the Creator?

"I was deeply and hideously impressed with the fact that all along that line of railway which we traversed, the whole of a pleasing landscape was entirely ruined by appeals to the public to save their constitution, but ruin their æsthetic sense, by a constant application to a particular form of pill. I view that prospect with the greatest misgiving. What is to become of our English landscape if it is to be simply a sanitary or advertising appliance?"—*Lord Rosebery.*

"I know to what lengths this hideous disfigurement may go, for I have sailed along the Lake of a Thousand Islands, where every rock yells at you with advertisements in letters of twenty feet in height."—*Mr. William Black.*

It will be remembered that Mr. J. R. Cobb, one of the first members of our society, whose recent death we have to deplore, rescued this splendid relic of a heroic time, the *Foudroyant*, Nelson's old battle-ship, from an ignominious fate. It had been sold to a German firm as old timber, and was about to be broken up, when Mr. Cobb repurchased it and restored it, as far as possible, to its primitive condition.* * * Un-

fortunately last summer, when it was lying at Blackpool, a storm which swept over the coast drove the vessel from its anchorage. Mr. G. E. W. Cobb, who had succeeded his father in the ownership of the *Foudroyant*, devoted himself night and day to the task of saving it from wreck; but a person in the locality, who desired to promote the interest of a notorious pill proprietor, saw in the hull only the 'groundwork' for a staring advertisement. He succeeded at night in emblazoning it with a name already painfully familiar to lovers of the picturesque.

"I made a tour in America about twelve or thirteen years ago. There the advertisements, which disfigured the scenery, struck me as something quite new. You know how proud our American cousins are of the Mississippi. There is the famous town of St. Paul; and here, amidst this glorious piece of scenery (the first I had seen along the Mississippi) my eye rested upon the words, in letters twenty feet high, 'Smith's Chewing Tobacco is the Best.' It is difficult to express what a shock such an apparition gives one for the first time; and I remember that in a little book I wrote about America, on my return, I dwelt on this defect in the American eye and conscience. I think, however, now, that England can in the abuse of advertising almost give points to America."—*Sir Lepel Griffin, K. C. S. I.*

"There is another form that advertisements are taking elsewhere. I was in my garden and I heard sudden reports of artillery; presently from the sky fell masses of green and red paper, advertising a tooth powder. These fell all over my garden, and I am not exaggerating when I tell you that these were, at least, spread over two acres; it took my gardener a week to collect all those pieces of paper which were blown out of the guns into my garden.

"The other day I was walking between Hammersmith and Kensington, and it happened to be blowing a gale of wind; a young man was hurrying down the street with a bundle of slips which he threw in handfuls into the roads, and the streets of Kensington were literally covered in a most disgraceful fashion."—*Mr. W. B. Richmond, R. A.*

In "girl advertisement squads" and "sandwich men," advertising reaches the height and depth of vulgarity, and helps to mark the limit of public tolerance. The street display of the female form in flesh and blood as a background for puffs of corsets or hair restorer, or to attract attention to the bicycle on which it is mounted, has effectually roused the dormant sense of decency in more than one city; and the spectacle of broken-down humanity turned into walking billboards has even more frequently stirred pity and disgust.

At a meeting of the council, held on December 2d, Mrs. ——— was able to speak from a very recent experience of the spread of advertisement disfigurement on the other side of the Atlantic. * * * The United States, in her opinion, were as yet much worse than England, although England was fast following in America's footsteps. She described one colossal poster which struck her as peculiarly offensive. Mentioning her dislike to it to the resident of the place, whom she afterwards met, he replied, "Well, now, I never noticed anything bad about it, but I shall never see it again without thinking of you."

Although we may not feel surprised at the defacement of our business quarters, there is no denying that the principal streets are a sight to behold. One man paints his entire building a gorgeous red in order to advertise an auction sale; another tints in glittering Scotch plaids to inform us of the wares for sale within. Hideous signboards of all hues, sizes and description deface buildings and distract the eye from

whatever architectural merit the street may possess. * * * Some of the worst of these are the advertisements around the new post-office. It seems too bad that our national government should set so bad an example.

What Chicagoan is not proud of Lincoln Park? Its beautiful drive along the lake, the wealth of flowers and shrubs in which it abounds, the statues that adorn it, are sources of neverfailing enjoyment to the people, who think well invested the $7,000,000 which it cost. But see what the billboards have done for it! At the chief entrance, near St. Gaudens' magnificent statute of Lincoln, there is a monstrosity of yellow, green and other glaring tints a block long. Washington Square is a charming place of public recreation, with the fine Newberry Library and churches around it, yet its effect is destroyed by a conspicuous billboard on one side.

The South Side is the chief scene, the classic home of the billsticker's activity. All the achievements of the North and West sink into insignificance in comparison. There are boulevards here which are perfect symphonies of the billsticker's art. Michigan avenue, that long and beautiful thoroughfare, once the pride of Chicago, might now be appropriately christened Billboard avenue.—*Chicago Times-Herald*, May 6, 1900.

I am sure (Mr. Kriehn continues) there is not one of us but has had his eye seriously offended by the hideous advertisements of all sorts of shades and colors. In San Francisco there are two hills with a street between, and on top of one in gigantic letters is the name, as I thought at first, of a modern Angelo or Raphael, but it turns out to be the advertisement of a clothing store, spoiling the whole scene. We need not stop to assure Mr. Kriehn that at Como (Italy)—home of the beautiful—may be seen a hillside monstrosity compared with which the Californian puff is modest.—*St. James Gazette.*

Paris.—Quite recently the *Debats* has, by a timely protest, succeeded in winning "an important victory over the bill-sticking spirit of the age," and rescuing the Ponts de l'Ile de la Cité from a glaring defacement. The huge réclame of a pushing Essence of Meat firm has for some years entirely spoilt that charming view from the Pont Neuf so well known to every visitor to the "gay city." The proprietor of the wall and house so defaced has, under pressure, promised that the advertisement shall never be renewed when once the Company's contract has expired.

"Here in remote Hawaii," writes Mrs. Todd, "every tree and shrub . . . is watched and cared for, and a total dearth of advertising signs on rocks and conspicuous places is enforced by law."

With this compare the case of Bermuda, as described by Lady Brassey seventeen years ago. "We proceeded through tortuous passages between tiny islets and rocks, which were in many instances disfigured by the hideous boards of enterprising tradesmen, stuck up in the most conspicuous places." But here again American civilization corrects what British stupidity permits. General Russell Hastings, an American resident, got a lease of the defaced Island, and removed the eyesores.—*St. James Gazette.*

Ceylon.—We find that this growing feeling of dissatisfaction is not limited to the mother country, for in May complaints were made to the Colombo (Ceylon) Municipal Council in regard to the enormous size and unsightly appearance of the sign-board on one of the factories of a tea-planter well known in this country for practices of the same kind in the prosecution of his retail trade. Though avowing its sympathy with the protest, the Council does not seem to have had any power to interfere.

Capetown.—The Capetown Town Council refused to entertain a suggestion made

(June 29th) by a well-known soap company that Table Mountain should be leased to them for use as an advertising medium.

Here (at New York City), it is fair to say that (unless the writer is suffering from the incapacity to appreciate local dis figurement), we may congratulate ourselves that we have stopped short of our British neighbors.

With us Grant's Tomb has not yet been used as a display board for magic lantern puffs; and neither of Trinity nor of any other of our public buildings is the view seriously marred by advertising signs. Our present Exchange is guiltless of posters, good or bad; and no advertisements encroach upon the few mural paintings we have. It would be hard, however, to suggest a more characteristic group than those reproduced here as the result of a hasty selection from innumerable examples.

Of the Brooklyn Bridge we are justly proud; and we compliment the importance of those who travel over it by bedecking the roofs visible therefrom as shown below :—

Photograph by Byron.

VIEW FROM BROOKLYN BRIDGE.

Out on the Newark Meadows such monstrosities as the 40 foot plaster, and blue balls each 18 feet in diameter, flank the "Big Store" advertisement—for which has been borrowed the general plan, if not the beauty of French's Columbia welcoming the nations to the Chicago Exposition—and harmonize well with their surroundings—the rank stretch of marsh with its foul water curdling green and its corruption shimmering in the sun, its foul air laden with stench and heavy with dust and coal, the rot and the reek of the salt meadows, that man has wholly wrecked and but partially conquered.

The region just northwest of Central Park, after long having been dreamed of as the Acropolis of New York, has now become known as Cathedral Heights. Columbia University is already built; the main building of St. Luke's hospital occupies a prominent site; St. John's Cathedral, to be the greatest of America, and among the most imposing in the world, is rising there; and the locality is, as it were, dedicated to the good, the true and the beautiful. It was, therefore, not strange that when the National Academy of Design found its old quarters too crowded, it selected there a spacious site, and, securing it, erected there its temporary schools, while it appealed to art lovers among New York citizens for subscriptions towards building a massive and beautiful home for itself with its marble colonnades, richly

decorated galleries, great halls and assembly rooms, all in chaste and classic style. But never was there a better opportunity for turning a penny in the billboard line; and never has such an opportunity been more characteristically improved than by the advertising to which the Academy has devoted the boarding of the premises at which it has established its free art classes for training the taste and inspiring the imagination of New York youth. No description can do justice to the subject.

PREMISES OF NATIONAL ACADEMY OF DESIGN.

The great Windsor Hotel fire on Fifth Avenue is still vividly remembered by New Yorkers as one of our holocausts in which scores of human beings left this world in fire; and its owner, a gentleman of great wealth and philanthropy, touched a chord of popular approval when, in answer to inquiries as to rebuilding, he was reported to have explained that, great as was the loss of interest and the expense of carrying vacant property, he preferred, for the time at least, not to trespass upon good taste by hastily putting up there another hotel for mere financial gain. It so happens that, on the opposite corner, lives a lady whose large-hearted humanity at the time of the fire added

another to those unselfish deeds which have made her ever more beloved by the people, not merely of New York but of the United States. It is inconceivable that the high-minded and sensitive proprietor of the Windsor site should wilfully do aught that would offend or deprave public taste. It will doubtless, therefore, forever remain equally a mystery why Mr. Gerry permitted, and why any advertiser was willing to pay for and exploit such a boarding as that below shown.

HOUSE OF MISS HELEN GOULD. SITE OF WINDSOR HOTEL.

It is scarcely imaginable that by any means the excellence of "Old Valley Whiskey," "Gold Lion Cocktails" and the variety of bottles in which they may be purchased could be so attractively brought to the attention of Miss Gould as to justify the expense of a lurid advertisement half a block long.

The long front of Miss Gould's house being opposite the boarding in question and the street just beyond being so cut off by the railroad bridge as to make it a cul de sac, the advertisement is otherwise practically worthless.

Since last October Dewey Arch at Madison Square, with its approaches, has been a center for the one art development among

us that of late has most stirred local pride and national interest, and for a mile up Fifth Avenue to the top of Murray Hill its features are the most prominent in the view of that thronged thoroughfare. For the whole distance, in a blaze of color by day and a glare of electric flash-lights by night, the sculpture and the lines of the Arch, as the case may be, stand out against and are contrasted with what is probably the most offensive advertisement that now challenges our brick-bats.

By permission of O. J. Gude Co.

In the daytime, the thirty-foot cucumber, in bright green on an orange background, above a field of scarlet, lettered in white, is incapable of description in words printable here. In the evening the dancing flash-lights of the "57 varieties" of beans, pickles, etc., thrown in the faces of all who throng Madison Square—the real center of the life and art of New York—are unimaginable except in nightmare.

At the corner of Broadway and Walker street is one of the

largest and most successful attempts to demoralize a corner, which, however, will soon be buried by the rising brick.

CORNER OF BROADWAY AND WALKER STREET, NEW YORK.

THE PALISADES OPPOSITE RIVERSIDE DRIVE.

Next to Niagara, the Palisades are the most famous of the natural beauties of our State. Directly opposite is Riverside Drive, that unsurpassed cliff boulevard of New York. Looking across the river from 80th street, this is the view of the Palisades from Riverside Drive.

From the lack of

anything suggesting a scale of proportions, the illustration utterly fails to express the brobdignagian barbarity of the great letters, the size of which may be inferred from the fact that the cliff is here, say, 250 feet high, and the trees at the top of large size.

WHOSE IS THE FAULT?

It is certainly not that of the sign painter. In the first place he is not the principal in any case; and in the second, the work of professionals is steadily growing more creditable in comparison with the crude horrors with which, by their special agents, advertisers used to daub the landscape.

The impression one gets from the literature upon this subject is that it is the advertisers who are to blame for the abuses—if they may be conceded such—that I have referred to. And, indeed, such was the impression of the writer until, on preparing this article, he seriously considered the question. He has now come to a different conclusion, and confidently suggests that, though the gentlemen who pay for these monstrosities should share the blame for them, they should do this only in common with their fellow citizens at large—the few who have actually become disgusted thereby being as yet too insignificant a part of the community to be entitled to special consideration. The only hope left lies in the fact that, since it is everywhere recognized as "good form" to agree with them, it may be expected that as years pass, a constantly larger proportion of those who wish to be considered cultured will actually feel what they now affect.

The following illustrate points of view:

Mr. Howell's commercial hero, Silas Lapham, "rose" by means of the "bold advertisement," and the judicious pushing of "Lapham's Mineral Paint."

I ve heard a good deal of talk about that S. T. 1860-X man, and the stove-blacking man, and the kidney-cure man, because they advertised in that way. * * * So long as the people that own the barns and fences don't object, I don't see what the public has got to do with it. And I never saw anything so very sacred about a big rock along a river or in a pasture, that it wouldn't do to put mineral paint on it in three colors. * * *

One managing director of a notorious soap concern has explained that he is animated by a desire to encourage British art and to extend the range of honorable employment, while an even more famous pill man has pleaded duty to the fishermen as his compelling reason for presenting to them sails embellished with his trade legend. * *

There are two medicines which compete for the execrations of the traveling public. We shall call one the Hepatic Globule, the other Okeley's Bolus. The former is pushed by a company, having its domicile in the United States. The other belongs to persons who, we grieve to say, are our fellow subjects. The respect-

ive managers of these two enterprises have been most opportunely interviewed by a representative of the Westminster Gazette * * * *
The American pill-man says :—

"At first we were the only firm who advertised in the fields, but very soon we were, of course, imitated by ever so many others.

"When introducing this form of advertisement, we had, however, not the slightest notion that the public feeling would go so strongly against it. In order, therefore, not to give offense, we shall discontinue every one of our field advertisements as soon as our lease is run out."

* * * * compared with his British rival, the American is tender-hearted. This is what the manager of Okeley's Bolus had to say:—

"We don't admit spoiling the landscape at all. Possibly in some places our boards are closer together than they need be, but that is because the owner of the land or the farmer has specially asked us to give him the benefit of a few more.

"Then I can't get you to express any compunction?"

"Mr. ——— laughed. "Oh, dear, no," he said. "We are not built like that in Lancashire."

For such cases, seems appropriate the practical, albeit somewhat heated, suggestion of an English friend:—

If Bloggs sticks the name of himself and his nostrum in buff and blue on a series of enameled plates, and if he gets a contractor to hammer these at intervals of every ten yards into every wall that he can hire within an indefinite area, he calculates that he will plague a remunerative number of passers-by into a vivid recollection of the commodity he wants to sell, and that, accordingly, the victim will purchase it in preference to that of a more modest competitor in the manufacturing line. Bloggs and the contractor will go on extending these operations as long as experience justifies Bloggs' calculations. But Bloggs is no fool, and when he finds that he loses custom instead of gaining it, Bloggs will desist.

The numerous malefactors who have made large expenditures to make the neighborhood of the Brooklyn Bridge offensive are business men, who, in the main, are careful of their money and know what they are doing. And, though they are likely to forget that public taste improves until they are rudely reminded of it, it is probable that their experience has justified them in believing that the kind of people who buy their wares are, on the whole, rather attracted than offended by such an exhibition.

The owner of the Palisade lots doubtless is as far as may be from either wishing to seem otherwise than a citizen of good taste, or from wantonly offending those whom he wishes to buy his lots. Those sky insulting letters cost money—a great deal of it—and were doubtless ordered only after much thought and conference. There they stand—yelling across to the most beautiful residence district of New York. They register the expert opinion of the man who has most interest to know that even the people whom he might expect to be eligible customers for the picturesque

sites in his hands for disposal are, on the whole, of so crude taste or of so stolid sensibility, that they may be thus at once startled and attracted into buying his lots.

As to the National Academy of Design, whatever one may think of its consistency, it has too long a record of self-sacrificing devotion to art education and art culture in our metropolis to have its motives questioned, or its willingness to sell its birthright for any amount of pottage for a moment suspected. We must therefore conclude that, in the opinion of those most interested in art culture and most anxious to promote it among their fellows, the taste and senses, even of the picked students whom that school selects for free instruction, are as yet too little developed to be endangered.

As to the owner of the Windsor Hotel site, his opportunities for observation are as good as ours, and his sincere public spirit unquestionable by us. It certainly has not occurred to him either that public taste would be shocked or depraved by the use he has allowed of his boardings, or that such use would be otherwise than pleasing to his lady neighbor.

If there be any conclusion to which the logic of events drives us, it is that the bean-pickle-radish concern of Madison Square, that has grown great, and, it is reputed, wealthy, by selling its goods to people in whose eyes, if not in whose mouth, it thus flings them, knows perfectly well what it is about.

And finally, on inquiring of a friend who, we thought, might know as to Ceylon conditions, we are told as to the case above cited from Colombo:

> The firm (of landscape spoiling advertisers) is that of Messrs Lipton, of which the head, Sir Thomas Lipton, is the owner of the yacht "Shamrock." He is by no means a bad fellow, but like others has no conception of the harm he does by sticking his name in huge letters on his premises. I have no sketch of the Ceylon establishment, but in his own newspaper advertisements I have seen pictures of them. Imagine a monster board on the roof ridge of a factory in the center of wild tropical vegetation, and you have enough to explain the feelings of some European in the neighborhood who understands what beauty and defacement mean.

It may be safely asserted that Sir Thomas Lipton never would have permitted this desecration if he either himself appreciated its vulgarity, or dreamed that his firm would thereby sell less rather than more tea, or believed that the gentlemen of wealth and culture with whom he is pleased to associate would think the less of him for having ruined Ceylon scenery to blazon his name.

Education, not objurgation, is evidently the proper remedy here.

It seems probable, indeed, that in this degradation of scenery, natural and civic, the public, cultured and otherwise, is really getting about the grade of art for which it has yet shown a practical appreciation. This does not mean that this public is incapable of better things, or that, in every direction, it is not hopefully stirring towards such a naissance (for we have scarcely the basis for a renaissance) of love for beauty as has never before blessed the world. But it does mean that the average taste is as yet too low for us justly to brand as specially vicious those who bait it. And since these panderers are so anxious to please their patrons and attract custom, the best and the most effectual way to reform them is to stir appreciation of and longing for better things among ourselves, their customers. It is therefore to popular education in art and beauty, to popular legislation when it shall be demanded by the people, and to prompt and loyal concession by advertisers to the normal thus suggested that we must look for aid.

PROGRESS TOWARD REFORM.

In fact these factors have already done much toward doing away with the worst features.

It is being every day better appreciated that there are logical and legal grounds for action. The following are a few of the well-argued points that are now generally accepted:

But street advertisements in the aggregate are beyond all question a nuisance. The persons interested rely on the recurrence of nervous shocks. If a man has physic to sell, and attempts to impress me with a sense of its merits by knocking me down every five minutes, I have my remedy in the police courts. If, again, he depend on lung power to puff his wares, and hire a small boy to shout into my ear every two minutes the name and title of the article in question, this also would be a matter for the justices. But if he commits assault and battery on my eyes, if he so arrange his execrable enameled announcements in blue and yellow, that, turn where I will, I am confronted with one at every step, I must suffer. * *

If a man's house is his own, the thoroughfare belongs to the community. He has no right to vex the sight of the thousands who pass his way with a dazzling announcement than to flash the sun in their eyes from his first floor with the help of a pocket mirror. * * *

There are, again, many to whom advertising is offensive, not because it offends the artistic taste, but because it is (through the eye) a vulgar intrusion on their intellectual calm. To them the perpetual iteration of one name or phrase in glaring colors jars on the nerves as much as the persistent solicitations of the same begging impostor at the same corner. If a shopkeeper runs after a citizen, takes him by the collar or follows him down the street, shouting out that he has pills to sell of extraordinary merit, the victim can appeal to the policeman; why should there be no relief

when the same shopkeeper presents himself at every turn in the shameless livery of paint or printing ink or glaze. * * *

"The State cannot undertake to guarantee the morals of its citizens, but it ought at least to enable them to pass through the streets without being scandalized, tempted or molested. The same rule * * * applies also to some things which may have no connection with morals; * * * to the gigantic advertisements by which private firms and vendors of quack remedies are now suffered to disfigure our public buildings, to destroy the beauty both of town and country, and to pursue the traveler with a hideous eyesore for hundreds of miles from the metropolis. This great evil has vastly increased in our day, and it urgently requires the interposition of the Legislature."—*W. E. H. Lecky, M. P.*

And, what is even more to the point, the public right is more and more enforced both by public opinion and the courts:

It has further appeared that the city of London does already exercise, albeit, in no very fastidious spirit, control over wall advertising, and that the Chief Commissioner of Police has discretion as to the trade embellishments of vehicles. There have been some remarkable rulings on the subject. A brougham decorated with floral puffery has been held intolerable, chiefly, it would seem, because the liveries worn by the gentlemen on the box were too grand to be consistent with the austerities of the perfumery trade.

Glasgow, at a sacrifice of £4,000 per annum, has decided that the municipal trams should not be disfigured by advertisements.

I should like to call attention to the fact that some eight or nine years ago Messrs. Hudson, of St. Paul's Churchyard, put up an enormous sky-sign, which attracted considerable attention in the public press. By its erection they were in fact blotting out one of our national cathedrals. There was a chorus of disapproval from nearly every journal in London, and Messrs. Hudson very speedily succumbed to that cry, and took down their sky-sign.—*Mr. Crackanthorpe, Q. C.*

Some time ago an attempt was successfully made to throw advertising notices by the aid of a flash-light on Nelson's Column. The Vestry of St. Martin-in-the-fields appealed to the Government, and the result was that this particular form of the practice was abandoned.

The Eastbourne Town Council brought an action against a boatman for having ————'s pills on the sails of his boat, as "disfiguring the foreshore," and obtained a prohibition of it? This was about a year and a half ago. The instance might be worth recording, as showing what can be done under existing laws and by-laws.

In New York within the last few months the case of Watson *vs.* Anterberg has become a precedent of direct recognition thus given to the worth of harmony in color, and the damage involved by such an incongruous discord as that complained of. Justice Lawrence, in the Supreme Court, has granted an order which has a bearing on the æsthetic value and appearance of signs. He has decided that an orange background with black and white letters is not in harmony with signs which are in black and gold. * * *

It appears that the plaintiffs leased the building from John Becker, and in turn sub-leased certain portions to the defendants. The original lease from Becker provided that no signs should be erected without his approval. The same clause was introduced in the sub-lease. It is alleged that A. Bretsch & Brother erected several signs, one of

them sixty-five feet in length; that "the said signs are painted on wood and are painted in orange-colored groundwork, the lettering being black shaded with white, and that said signs are different in character and aspect from all the signs in the neighborhood of said premises and are unusual in design and color." * *

The letters and numerous photographs of the signs are part of the court record. —*N. Y. Times*, March 24, 1900.

Moreover, legislation is rapidly becoming more definite and comprehensive; and municipalities are receiving and using ample powers to protect such of beauty as they possess; and by prohibition of offensive advertising, by public provision for proper notices; by systematic regulation of those permitted by taxation arising in proportion to undesirable features, the leading cities of the world have this problem now well in hand. In foot-notes are here given the principal provisions of the more important of the laws now in force.[1]

Most important of all, however, are the evidences on every hand of increasing public interest in the preservation of the beauty of our scenery, and the decency of our streets from advertising depravity.

In every civilized country—in our own to a more rapidly increasing extent than elsewhere—societies for the preservation of scenic beauty, for the clearing from streets and sky views of the vulgarity that has defaced them, have already accomplished so much, and this with such popular support and approval, as to show that the evil can and will be dealt with wherever a few are willing to lead. Even New Yorkers may hope for a millennium when the city shall give the elevated roads and street cars the

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[1] FRANCE—Abstract of article on *Affiche* (Placard advertising) in Bloch, *Dict. de l'Administration Française*. Official announcements of nearly all sorts are printed on white paper in France. If private persons use paper of this color for placards the printer is subject to a finef 100 fr. ($20.00).

Painted signs are subject to special regulations. According to the *Loi de finances* of July 8th, 1852, art. 30, all signs of this sort in a public place, on a wall, or on any sort of a construction or even on cloth (*toile*-cloth, linen, sail, canvas, curtain) are subject to a fee amounting to 50c. (10 cts.) for signs of a meter square or less and to 1 fr. (20 cts.) for larger signs.

Every person who wishes to advertise in this way (*i. e.* by painted signs) must obtain authorization to do so, and is obliged to pay a fee to the Bureau of Registration in the arrondissement to which the communes belong where he intends to put up his advertisement. In the Department of the Seine there are bureaus specially designated for this purpose. A fee is collected on presentation of a declaration containing:

(1). The text of the sign.

(2). The names, occupations and residences of those in whose interest the sign is to be posted; and the contractor who is to post it.

(3). The size of the sign.

choice of not using the streets or using them for transport alone—except to the extent that under heavy license taxes a limited number of advertisements shall be permitted under such strict regulations as shall clear away offensive boardings and prohibit the worst of their present sins against good taste.

It is a "good sign," too, when such action is taken by a pro-

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(4). The number to be posted.

(5). The designation of the streets and places in which each sign is to be posted.

Violations of Art. 80 of the law of July 8th, 1852, and the regulations of August 25th of the same year, may be punished by a fine of from 100 to 500 fr. ($20 to $100), and also by penalties provided in Art. 464 of the Penal Code.

Paris.—For some time there has been much agitation regarding the preservation of the beauty of the scenery of France from desecration by the immense signboards which add such characteristic charm to the American landscape seen from a railway train. All protestations have been unavailing. Naturally, it is impossible to forbid the landed proprietor letting out his estate bordering a railway for advertising purposes.

M. Caillaux, Minister of Finances, while realizing this, evidently sees no reason why it should not be turned to account for budgetary purposes. He has, therefore, determined to impose a heavy tax upon all these signboards.

Shopkeepers and patent medicine discoverers may still advertise to their hearts' content, but in future will have to pay heavily to the state for doing so.

It is not believed this step will do away with landscape desecration, but it may diminish it. At any rate, it will be a source of income to the government.—*N. Y. Herald*, January 5, 1900.

GERMANY, Berlin.—Police Regulations of the 26th of Jan. 1880.

On the basis of sections 5, 6 and 11 of the law of March 11th, 1850, the Police Presidency, after consultation with the municipal executive board (Gemeindevorstand), issues the following regulation for the narrower police district of Berlin:

Sec. 1. Public advertisements may only be posted in public streets and places on advertising columns, boards, etc., especially prepared for that purpose. The right of local public officials, however, to post their notices, ordinances and advertisements in other places is not affected by this regulation. Also the right of landowners and renters to hang from or to post advertisements which concern their own interests alone on the property owned or rented by them is not affected by this regulation.

Sec. 2. The advertising columns, boards, etc., mentioned in Sec. 1, may only be erected with the consent of the Police Presidency, the local Magistrat, and of the municipal police charged with the administration of street construction, (städtische Strassen-Bau Polizei Verwaltung.) The approval of the same authorities must also be obtained with regard to the form of advertisements to be posted on them, and also for the charges made for such advertisements. Local public authorities may claim the necessary advertising space for their notices, ordinances and advertisements free of charge.

Sec. 3. Paper of a red color may not be used for advertisements to be posted in such places, as this color is reserved for the notices of the local public officials.

Sec. 4. Advertisements of the sort mentioned in section one may be posted or removed only by persons who are designated to do so by the owners or their representatives (*i. e.* the contractor owning these advertising rights). Nevertheless, local public officials have the right in cases of emergency to post their notices at any time, either directly through their official subordinates or through other persons designated by them.

fessional body as was lately taken by the annual meeting of the Architectural League of America, which announced as one of its aims; "The abolition of the bill board nuisance in cities." To be sure, the wonder is that architects have not earlier attacked the problem of preventing their best works being ruined by advertising defacement. But this only shows that the artistic sense of

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Sec. 5. Violations of the preceding regulations, in so far as they are not punishable with higher penalties by the General Penal Code, are punishable by a fine of 30M. ($7.50), or corresponding imprisonment in case the offender is unable to pay the fine.

The official reports contain an account of the discussion in the Berlin city council of the contract for the renting of advertising columns in the city of Berlin for the ensuing ten years. Prior to 1880, the city received a rent of 5,000M. ($1,250) per year from this source; from 1880 on it had been receiving 50,000M. ($12,500) annually. In the discussion of the new contract drafted by the Magistrat it was suggested that in the future bidders should be required to pay a certain percentage of their gross income to the city, not however to amount to less than 135,000M. ($33,750) for these advertising columns. The minimum rent of 100,000M. ($25,000) contained in the contract as drafted by the Magistrat was allowed by the council to go through however. Instead of binding the city to accept the highest bid for the contract the Magistrat was left free to select its man regardless of the one offering the highest rent among the bidders. The reason for so doing was that as a percentage basis was to be adopted quite as much depended upon the honesty and ability of the contractor as upon the percentage he might offer to pay. *During the discussion of the contract, the proposition that advertising columns should be illuminated at night came up for consideration but was rejected.*

The substance of the form of contract finally adopted is as follows:

One column must be erected in each city district. At the time the contract was drafted there were but 400 such columns in the city. 116 city districts were entirely without them. The new contractor was therefore to pledge himself to erect at least 116 columns at his own expense, 100 of which were to be put up at once, and the remaining 16 later in such places as the Magistrat should direct.

The columns are to be erected in accordance with the plan approved by the Magistrat and the local police authorities, and must have an advertising space of between eleven and twelve square meters each, and must not exceed a diameter of 1.2 meters.

On the upper edge of the base of each column the following information must be given in easily readable form:

(a) The number of the city district,
(b) " " " " police station in the city district,
(c) " " " " nearest postal and telegraph office,
(d) " " " " " fire alarm,
(e) " " " " " ambulance station,

and also directions for obtaining carriages for transportation of persons suffering from infectious diseases, which may be ordered by telegraph free of charge from each police station. The contractor must make all necessary changes from time to time in these notices.

With their erection the columns become part and parcel of the public streets and pass into the ownership of the city without any special act of transfer. During the continuance of the contract, they must be kept by the contractor in a condition satisfactory to the Royal Police Presidency and the Magistrat.

During the continuance of the contract the city promises to confer upon no other contractor the right of erecting similar advertising arrangements in public streets and

our architects has been as numb as still seems to be that of our National Academicians; and leaves us to hope for no end of regeneration when the eyes of both shall have been opened. To help open them should be the pleasure of every patriotic citizen.

I cannot better close this rambling article than by a quotation showing at once how much is yet to be done and the spirit in

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places This, however, does not apply to kiosks and other arrangements whereby advertisements in the shape of inscriptions upon wood, lead, glass, linen and similar substances may be displayed.*

If the proper authorities desire the removal or temporary displacement of the advertising columns in the public interest, this must be done at the expense of the contractor.

The contractor is obliged to post advertisements in the order of the applications made to him by advertisers, an exception may only be made in order to avert some threatened danger. The contractor is not obliged to display advertisements of the same sort on more than 200 columns at the same time. This does not apply to official notices. Placards not of the regulation size may be refused by the contractor. He is obliged to refuse all advertisements whose contents are contrary to law.

The following minimum tariff is established:

SIZE.			Space on Col. per 100 signs per day.	Charge for posting per 100
a	Size I	Quarto 18x24 cm. (7x9½ in.)	40 Pf. (.10)	25 Pf. (.06¼)
b	" II	Folio 36x24 " (14x9½ ")	80 " (.20)	40 " (.10)
c	" III	Double Fol. 36x48 " (14x19 ")	1M. 20 " (.30)	75 " (.18¾)
d	" IV	Half Eagle 72x48 " (28x19 ")	2M. 50 " (.62½)	1M. 50 " (.87½)

Excess of space in placards of larger than the IVth size to be charged for at the rate of Size I.

The contractor is to pay a percentage of his annual gross receipts to the city, not, however, to be less than 100,000 M. per year. Careful provisions are made guaranteeing to the city the right to examine his books at any time. Without permission, the contractor may not transfer his rights under the contract to another. He is obliged to deposit a bond of 10,000 M. ($2,500) with the city to guarantee the faithful performance of his contract. * * *

Among the propositions made to the Magistrat while they were considering the renewal of this contract was one coming from Herr von Schirp, an editor, who offered to build some 400 or 500 public comfort stations free of cost to the city, provided he was given the right to the advertising space in them. This proposition was not accepted by the Magistrat.

Before the final adoption of the form of contract mentioned above, the Magistrat of Berlin made a few changes, the most important of which was the fixing of a minimum rent of 200,000 M. ($50,000) per year. It was also determined that bids in the shape of lump sums and not in percentages should be asked for. The contractor was to be required to deposit a bond with the city authorities of 50,000 M. ($1,500). The official stenographic report for the 19th of March, 1891 (No. 10 p. 134) contains the information that the contract was finally awarded to Nauck & Hartmann at the yearly rental of 250,000 M. ($63,750) for the term of 10 years.

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* From the previous section of the contract it is evident that only *printed* advtrtisements are to be placed on the advertising columns.

which this is being undertaken in Belgium, the country where such problems as those we have mentioned were earliest attacked.

The following is from a speech by deputy Carton de Wiart, in the Belgian House of Representatives, April 6, 1900.

"To preserve the beauty of our monuments, our sites, and our ruins, it is every day getting more urgent that we protect them from

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ITALY. Municipal Ordinance of Rome.

Art. 1st. The posting of municipal and government acts will be made on the marble tablets owned by the municipality and devoted to this use. The posting of private announcements, printed or written, will be made on bill boards.

Art. 2nd. For posting on the bill boards a license from the municipality is required. This license will be given to all who have the consent of the proprietors of the real estate on which the boards are to be erected, if there is no reason why that locality should not be thus used; as to which the municipality reserves full discretion.

Art. 3rd. Application for license must be made on paper bearing a fifty centime (10c.) revenue stamp, directed to the mayor and summarily stating:

(a) The locality or localities where it is proposed to erect the bill board;
(b) Names and addresses of owners of the real estate involved;
(c) Number of boards desired in each locality respectively;
(d) Size in square meters of boards proposed.
(e) Certified consent of the owners of the real estate. These certificates will be retained and returned only when the license expires

Art. 4th. For ornamental reasons a model of a bill-board frame will be kept in public view at the city police office, and in accord with this model every bill board must be constructed. The municipality reserves the right to remove boards already erected in case they be found unseemly, and parties who have heretofore erected such should adopt the model prescribed.

Art. 5th. The license will be revocable at pleasure of the municipal authorities without indemnity, but otherwise will be good for twelve months, and renewable at the end of each year, upon payment of twenty-five cents for each square meter on each board. Each board in depth and breadth must not be over two meters and a half, except that for theater show bills boards may be three meters high and five meters long.

Art. 6th. After the annual payment has once been made, it will not be reimbursed in case of taking down of the boards, whether this be voluntary or compulsory.

Art. 7th. Each board, besides the names and addresses of the proprietors, shall bear a number given in progression by the city police office. No board shall be transferred from its appointed place under license to another locality without the permission of the municipal authorities.

Art. 8th. The municipality reserves the right, at the offender's expense, to remove any bill board in case it violates this ordinance. * * * *

ENGLAND—London Sky-signs Act, 1891; Municipal Affairs, Vol. III., p, 718.

Sky-signs means any word, letter, model, sign, device or representation in the nature of an advertisement, announcement, or direction on or attached to any post, pole, standard, framework, or other support wholly or in part over any house, building or structure, which, or any part of which sky-sign shall be visible against the sky from any point in any street or public way and includes all and every part of such post, pole, framework standard, or other support. The expression sky-sign shall also include any balloon, parachute, or similar device employed wholly or in part for the purposes of advertisement of announcement on or over any building, structure, street, or public way, but shall not be deemed to include (i) any flagstaff or pole, (ii) any vane or weather-cock unless adapted or used wholly or in part for the purposes of any advertisement or announcement, or (iii) any sign which is securely fixed to or against but not over any building or which rests immediately upon the top of any wall or building being of one continuous face and not open work, or (iv) any such word, letter, model, sign, device,

the leprosy of trade advertisement. The most beautiful suburbs of our capital city are spoiled by pressing appeals to use X soap and Z chocolate. At the end of every perspective, letters as tall as houses offer burglary insurance. As we near our cities the billboards thicken. Through our dales and over our hills, X soap and Z chocolate ever pursue us. * * *

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or representation as aforesaid which relates exclusively to the business of a railway company and which is placed or may be placed wholly upon or over any railway station, yard, platform, or station approach belonging to a railway company and which is also placed that it could not fall into any street or public place. * * *

4. From and after the passing of this Act it shall be unlawful to erect any sky-sign as defined in this Act within the administrative county of London.

London County Council.—After a brief discussion, the Council at the meeting on Tuesday, March 20, 1900, adopted the following by-laws in regard to the use of flash and search lights:

Flash and Search Lights.

(1). No person shall exhibit any flash light so as to be visible from any street and to cause danger to the traffic therein, nor shall any owner or occupier of premises permit or suffer any flash light to be so exhibited on such premises.

The expression flash light means and includes any light used for the purpose of illuminating, lighting, or exhibiting any word, letter, model, sign, device, or representation in the nature of an advertisement, announcement, or direction which alters suddenly either in intensity, colour, or direction.

(2). No person shall exhibit any search light so as to be visible from any street and to cause danger to the traffic therein, nor shall any owner or occupier of premises permit or suffer any search light to be so exhibited on such premises.

The expression search light means and includes any light exceeding 500 c. p., whether in one lamp or lantern, or in a series of lamps or lanterns, used together and projected as one concentrated light, and which alters either in intensity, colour, or direction."

SCOTLAND—124.—(1) No person shall erect, exhibit, fix, maintain, retain, or continue any advertisements, whether existing before or after the passing of this Act or not, upon any land, house, building or structure, except on such sites, boardings, or other structures as the Corporation may license, which they are hereby empowered to do. Such license shall be in writing, and may be granted for any period not exceeding four years, and no fee shall be charged therefor: Provided always that a license shall not be necessary in respect of any site for advertisements (not being illuminated advertisements) of the classes following, namely.—(1) advertisements exhibited within the window of any house or building; (2) advertisements relating to the trade or business carried on within the land, house, or building upon which the same are placed (and not being sky signs as defined by the Glasgow Police (Further Powers) Act, 1892), or to any sale, feu, or letting of such land, house, or building, or any effects therein, or to any sale, entertainment, or meeting held in or upon the same; (3) advertisements exhibited within any railway station or upon any wall or other property belonging to or occupied by a railway company so far as relating to their own business; (4) and for a period of five years after the passing of this Act advertisements upon a site which was occupied by advertisements on the first day of March, one thousand nine hundred, not being illuminated advertisements. * * * *

125. (1). Every person who proposes to erect any boarding or similar structure to be used either wholly or partly for advertising purposes upon any lands and heritages in, abutting on, fronting, or adjoining any street or court, shall present a written application to the Dean of Guild for decree so to do, accompanied by relative plans, and the Dean of Guild may, on being satisfied that the Corporation have granted a license therefor as provided for in this Act, and on being also satisfied as to the stability and sufficiency of such boarding or similar structure, grant decree accordingly. The Dean of Guild, if desired by the applicant, and subject to such conditions as the Dean

"Why, gentlemen, what really is our native land? When we speak of it, what comes to our thoughts? Is it this gathering of black clad gentlemen who are working here by gaslight in foul air? (Laughter.) Or, indeed, those other gentlemen in black who tie red tape behind the grilles and the bars of our government offices? (Renewed laughter.) Do we think of those cold stone

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of Guild may prescribe, may remit to the Master of Works, to examine any such application and relative plans, and with power to the Master of Works, on being satisfied therewith, to grant authority for the erection of such boarding or similar structure, with such modifications and under such conditions, if any, as the Master of Works may think proper, which authority shall have the same effect in all respects as if a decree had been granted by the Dean of Guild, and in the event of the Master of Works refusing to grant such authority the applicant may appeal to the Dean of Guild.—Glasgow ordinances.

NEW YORK.—Extracts from Charter of New York City.

49. Subject to the provisions of this act, the municipal assembly shall have power within said city to make, establish, publish and modify, amend or repeal ordinances, rules, regulations, and by-laws not inconsistent with this act, or with the constitution or the laws of the United States, or of this state, for the following purposes:

14. In relation to exhibiting banners, placards or flags in or across the streets, or from houses or other buildings. * * *

16. In relation to the exhibition of advertisements or hand-bills along the streets, avenues or public places. * *

Powers of Park Commissioners.

Sec. 611. The [park] board shall also appoint without definite term a landscape architect, skilled and expert, whose assent shall be requisite to all plans and works or changes thereof respecting the conformation, development or ornamentation of any of the parks, squares or public places of the city, to the end that the same may be uniform and symmetrical at all times. * * *

Sec. 612. Subject to such general rules and regulations as shall be established by the board, each commissioner shall have charge of the management and be responsible for the care of all such parks, parkways, squares and public places as are situated in the borough or boroughs over which he has jurisdiction and of the streets and avenues immediately adjoining the same; * * * It shall be the duty of each commissioner, subject to such general rules and regulations and in conformity therewith, to maintain the beauty and utility of all such parks, squares and public places as are situated within his jurisdiction, and to institute and execute all measures for the improvement thereof for ornamental purposes and for the beneficial uses of the people of the city. * *

Laws of New York 1896, Chap. 836.

The said department [Department of Public Parks] shall also have the power to regulate and determine the height and character of all fences in or about all vacant or unimproved lands fronting upon or adjacent to all public parks, squares and places in said city, and to regulate and control the exhibition of advertisements thereon or structures intended for advertisements or the exhibition of advertisements upon any lands fronting upon the public parks, squares and places in said city.

NEW JERSEY.—An Act Concerning Licenses in Cities of N. J.

Be it enacted by the Senate and General Assembly of the State of New Jersey, That it shall be lawful for the common council, board of finance, or other legislative body, however designated, of any city in this state, to provide by ordinance for the licensing of bill posters, card tackers, bill distributors, advertising agencies or any other medium of distribution or display of printed or written advertising matter, and to adopt such rules, regulations and restrictions with reference to the conduct of the business to be carried on by such licenses as it shall seem proper.

allegories, those lion-escorted matrons by whom sculptors undertake to personify our country? Not a bit of it.

"Our country; 'tis the rolling lands, the running waters, the cities and villages planted on our great highways. It is all that beauty mid which our ancestors lived, loved and suffered, mid which our children shall live, love and suffer in their turn; it is all

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OHIO.—Statutes of Ohio, May 21st, 1894.

Sec. 1. Be it enacted by the General Assembly of the State of Ohio, That section 2,669 of the Revised Statutes be supplemented by a supplemental section additional to those already in force with section renumbering as follows:

Sec. 2669*c*. That the council of any city or village may provide by ordinance for licensing bill posters, advertising sign-painters, bill-distributors, card-tackers and advertising matter of any article or compound which has not been manufactured or compounded within the corporation limits of such municipality. In granting such license said council may exact and receive such sums of money as it may think expedient, and may delegate to the mayor of such city the authority to grant and issue such license and revoke the same. Providing that nothing in this section shall be construed to authorize the council of any city or village to exact and receive a license fee from merchants doing business in such city or village, for advertising their own business."

MASSACHUSETTS.—Boston Ordinance.

No person shall, except in accordance with a permit from the superintendent of streets, * * while on foot carry and display any showcard, placard or sign. * * *

No person shall except in accordance with a permit from the board of aldermen, place or maintain an American flag on which is placed, or to which is attached any word, figure or design, so as to project into or over any street. * * * *

Nor shall any person distribute to persons on a street handbills, cards, circulars or papers of any kind except newspapers. * * *

No person shall, without the consent of the Mayor, put up or affix in any manner, or paint, print or write, or cause to be painted, printed or written, a notice, advertisement or bill upon a curbstone, sidewalk, tree, telegraph pole, or lamp post in a street or public place, or upon walls, fences or buildings belonging to the city. * *

[Every proprieter of any place of amusement] shall prevent his place of amusement or any performance or exhibition therein from being advertised by means of pictorial posters or placards which have not been approved by the committee on licenses.

CALIFORNIA—San Francisco Ordinance.

No person shall: (1) Upon any sidewalk, carry, bear or support any banner, sign, transparency, framework, device or emblem, intended, or tending or purporting to be used as an advertisement or publication of any trade, profession or business, place of business, office, store or occupation; or (2). Cause or permit to be carried, hauled or drawn on any dray, wagon or other vehicle, on any public street of this city or county, any banner, transparency or framework, intended, or tending or purporting to be used as an advertisement or publication of any amusement or exhibition, place of amusement or exhibition. * * *

It shall be unlawful for any person to paste, paint, affix, or fasten on any telegraph, telephone or electric light pole, or on the sidewalk or roadway of a public street, in the City and County of San Francisco, any advertisement, bill, notice, card, sign or advertising device; and it shall be the duty of every person, firm, corporation or business representative thereof, named in or authorizing the publication of any advertisement, bill, notice, card, sign or advertising devise, which is now or may be pasted, painted, affixed or fastened on any telegraph, telephone or electric light poles or on the sidewalk or roadway of a public street in said city and county, immediately to remove such advertisement, bill, notice, card, sign or advertising device. * * * *

No person owning, possessing, occupying or having the control of any building in this city and county, shall put, place, construct, erect, build, maintain, or suffer to

these inanimate things to which our memory attaches somewhat of our own soul.

"Our Belgian land; 'tis the varied and changing landscape that rises from the Flemish shore to the last table lands of Ardennes, developing its charms in an ascending scale toward perfect beauty. First there are our beaches, our waste dunes, the broad calm of our lakes; then the Flemish cities that mirror the majesty of their belfrys and their cathedrals in the serenity of their canals; the suburban towns that cluster in every direction over the fertile plains, Brabant with its dug ways and forests, Hesbaye with its open fields, the cliffs that stand forth, the brooks that dance on their way, our streams and our beautiful river rolling along their clear waters between the shadowy walls of their valleys; and then, last of all, that dry and rocky tract of Ardennes whose broad horizon pours somewhat of heroism into the hearts of its people. That is our native land; or, if you prefer, the beloved face of our mother country—cold perhaps to

be or remain thereon any sign, or advertisement, or framework, boards or material on which any sign, advertisement, picture, bill or notice is painted, printed or made, or fastened, which exceeds three feet in height, and where the same is constructed in parts, such parts together shall not exceed said height. And when more than one sign, advertisement, etc., heretofore enumerated, shall be placed on a building the same shall be placed at least ten feet apart from the top of one to the bottom of the other.

No person owning, possessing, occupying or having the control of any premises, or any real property, shall put, place, construct, erect, build, maintain, or suffer to be or remain thereon or thereover, any sign, or advertisement, or fence, and framework, boards or materials on which any sign, advertisement, bill and notice, is painted, printed or made or fastened, and which sign, advertisement, fence, framework, boards or materials is supported, maintained or kept up by posts or a post, and which is more than ten feet above the ground, or more than ten feet above the level of the street adjoining the said premises of said real property, or shall suspend or suffer the same to be suspended thereon or thereover, more than ten feet above the ground or the level of said street. * * *

Gas lamps and electric lamps on which signs may be placed shall not exceed in size the lamps and globes now used respectively by the San Francisco Gaslight Company and the Edison Light and Power Company in lighting the public streets; and no inscription or sign other than the name and the business of the person or firm, at whose expense and in front of whose premises the lamp is erected or maintained, shall be placed thereon. The lamps or globes shall have no colored glass, and the same must be left open at the bottom, and no inscription or sign shall be placed on that portion of the lamp or globe facing the building or premises in front of which it is placed. The said lamps or globes to be suspended in front of the building or premises at a distance not to exceed two and one-half (2½) feet therefrom, and at a height of not less than eight (8) feet above the sidewalk.

All clocks erected on the sidewalk shall be ornamental in character and construction and shall be erected just inside and abutting on the curb line. All clocks so erected shall be of a height not less than ten (10) feet and not to exceed three (3) feet in diameter. No advertisement, notice or sign shall be painted, placed or fastened on the same other than the name and the business of the owner of the clock, which may be placed on the dial of the same, but on no other place. All clocks erected or maintained hereunder shall be kept in good order and condition and correctly indicate the time.

foreigners—who, perhaps, reserves for us alone, her children, her charms and her emotions; and which we should respect as the dearest heritage of our race. (Cheers and cries of 'Very good.')"

MUNICIPAL EMPLOYMENT AND PROGRESS.

By John R. Commons.

The final test of every social institution is the progress which it makes. Its period of youth and struggle is usually one of improvement. But if for any reason it reaches a period of decay then it gives way to a progressive competitor. Municipal employment must come to this test. It must promote progress more effectively than private employment, else it will give way to private employment.

This proposition is averse to the contention of M. Block in his *Dictionnaire de l'Administration*, where he holds that the ideal public administration (of which municipal employment is a part) is essentially conservative. Its purpose is not to introduce innovations, but to get the highest perfection out of existing arrangements. I hold that public employment must be inventive, progressive, original, "dynamic," else it cannot permanently contend with the contract system.

But progress is a vague term; it needs defining. In truth there is but one progress, namely, an increasing and improving population. These are the product in large part of a nation's institutions, and in the long run the institution that conditions all others and determines the number and kind of population is the industrial institution. Industrial progress has two features, greater command over nature and wider service to men. More explicitly, this progress is in three directions: extension of service, improvement of quality, reduction of cost. These are the three divisions under which we must test public employment. Does it promote human progress by a wider and wider extension of its benefits to all men, by furnishing a better and better product, at a diminishing cost?

EXTENSION OF SERVICES.

The first of these lines of progress—the wide extension of industrial service—is not only a peculiar feature of public employment, but it is a feature that is likely to be overdone. At least it

is a fruitful field for criticism. In a democratic community, any public enterprise is strikingly open to what might be considered uneconomical extensions. The different localities and the different interests which are represented in the legislature can, by well-known methods of log-rolling, acquire an extension of services which a private business could not afford. The added expense is borne by the community as a whole. Land speculators get sewerage, paving, water-mains and electric lights carried out to their properties far in advance of population. Special interests, also, as well as localities, draw upon the public funds. Cities open parks, schools, baths, for the poorer classes without regard to economics.

Considering all these peculiarities of municipal employment, it is plain that political and social motives are often more powerful than economic ones. Municipal employment is not to be judged from the standpoint of net revenue. The quantity and extent of a service and the rate of charge, or even the free use of the service must be taken into account. If it is desired to restrict free service and to lessen the demands for extensions, the simplest method is to require localities to bear the added expense incurred in their behalf. This is proper enough in the case of paving, sewer and water extension, where the benefited land values can meet the expense; but in many cases, such as the post office and postal telegraph, such a burden upon the poorer localities would deprive them altogether of the service. It is in these cases the part of a wise public policy to conduct the business on the system of deficits rather than restrict the wide use of the service.

IMPROVEMENT OF QUALITY.

Similar arguments hold true regarding the quality of public work. Municipal employment generally produces better quality of work than contract employment under similar circumstances. For the same reasons, municipal employment is continually improving the quality of its work. The public authorities are not compelled, like private employers, to "make ends meet." They can coolly contemplate a permanent or even an increasing deficit, because they can look to the general taxing power to help them out. Moreover, the heaviest pressure from the public is from the users of their services and not from the taxpayers. Complaints are daily made if the streets are dirty, if the water is microbic, if

fires are not extinguished promptly, if burglars are at large; but complaints are made only at election times if taxes are heavy. Consequently, the authorities are alert to increase facilities but slow to economize.

When to this pressure from the public is added the tendency of employees to execute work of a little better quality than is needed, and so to "make work," it becomes evident that direct employment is inherently far in advance of private contractors on public works as regards the motives to improve the quality of the work. But for the very reasons for its preeminence in the line of improving the quality, municipal employment shows unfavorably in the line of diminishing the costs. Here is the serious obstacle in the path of public employment under democratic conditions, and in this field, therefore, our careful thought is most needed. It is to the defects and not to the excellencies of public work that the citizen should direct his attention.

REDUCTION OF EXPENSES.

The problem of reducing the expenses of municipal employment meets with obstacles in two directions, first, from the employees, second, from outsiders.

Employees naturally resist a reduction of the labor cost because it means for them increased work or diminished pay. How to overcome this perfectly human instinct, is the grand problem of the civil service rules and the organization of the department. These will be noted later.

As to outsiders, there are two classes who instinctively resist improvements that tend to reduce the labor cost. These are politicians and labor unions. The politicians dread the curtailment of their power to reward their "heelers" and "workers." The more positions to be filled, the larger the army of partisan retainers. The labor unions are the organs for expression of the widespread conviction of laborers that anything helps labor which increases the number of jobs or lessens the supply of laborers. Without looking far or ahead to see whether extravagant, luxurious and wasteful jobs might not be a social injury and might not curtail work in other directions, they see only the limited jobs immediately at hand and their own unlimited numbers crowding for employment. I mention labor unions, not that they are more culpable than other laborers, but that they are the most influen-

tial of all laborers in forcing this policy of "making work" upon the public authorities. In those cities where unions are strongest, there it is usually found that municipal employment is burdened with the largest proportion of unneeded laborers, and that almost impassable obstacles are met to the economical reduction of these "fat" jobs. This is directly traceable to the avowed efforts of the unions. Politicians and labor unions combined, therefore, make the task of retrenchment both difficult and ungracious. Their influence is shown strongest in the resistance to labor-saving inventions, and, to make our discussion of improvements concrete, we may narrow it to this question: What remedies will overcome the resistance of labor unions to the introduction of labor-saving inventions on public works? There are three classes of remedies which cover the field, namely, exhortation, economic reform and administrative reform.

EXHORTATION INEFFECTIVE.

Exhortation is an appeal to the so-called higher motives of patriotism, duty, self-sacrifice, honor, love of mankind. It strives to lift the hearer above the interests of self and to move him by the wider interests of others. It may indeed descend to advocate the interests of self in the future or the interests of one's children in years to come, but it does this in order to lift the mind from the daily temptations and desires roundabout.

Such an appeal has its place. Labor unions may be urged to regard the interests of society as well as their own. They may be exhorted to look to their own future interests. No policy could be more destructive nor more certain of reaction than that which loads municipal employment with useless laborers. The Philadelphia gas works were turned over to a private corporation largely because of the extravagance of municipal operation in the employment of labor. Direct employment was abandoned in Cincinnati on the same ground. The stronghold of the contract system throughout the country resides in the popular dread of soft berths for politicians and useless jobs for laborers. Surely it would seem that in the interests of their own future welfare, to say nothing of social progress, the labor unions might properly be exhorted to abandon their short-sighted resistance to economical public employment.

But there are important facts not to be overlooked. The

inducements offered by exhortation are remote and problematical, but the stress of unemployment is here and now. Laborers in large numbers cannot take the long look ahead. They cannot wait. They cannot live upon their capital, for they have none. They must have a job and have it quickly. Their children are hungry now; when they are grown, they too must take their chances.

Again, exhortation is discounted by the laborer's knowledge of those who resort to it. He sees that some of them do not understand the economic and administrative conditions under which he is laboring, and others are diverting attention from the injustice of these conditions. Exhortation is valuable when it is directed to economic and administrative reforms, but it is "buncomb" when it flies high above the every-day needs of life. Economic reform and administrative reform come through legislation, and the exhorter declares that *law* will not make men better nor conditions better. Only a change in their motives—less selfishness and more self-abnegation—will bring what the laborers want.

This view misapprehends the part played by sound legislation. Law indeed does not directly make men better; it only takes away from the worse men such evil advantages as they may have over the better men in the struggle for subsistence. It does not make a bad man good—it only keeps him from suppressing the good man. It swings the advantage to the side of the good man, and in the competitive struggle gives the good man the lead. Indirectly society becomes apparently better, but it is only because there already existed the necessary quota of good men awaiting to be freed from the shackles by which law had permitted the bad men to bind them. Preaching and exhortation might continue for year upon year with only the result that larger numbers of good men would be sacrificed, unless the preaching led to legislation which would secure the good a new advantage in the struggle. Exhortation is partial. It reaches only those who hear and understand—that is, those who need it least. Those who need it most do not listen. But legislation is comprehensive. It controls those who do not understand by creating for them a new and immediate self interest which they can appreciate. This is all that is meant when I say that economic reform and administrative reform must be added to exhortation. These reforms, if rightly framed, take from the short-sighted and selfish the advantages which they have over the patriotic and self-sacrificing.

ECONOMIC REFORM NOT THE PROPER REMEDY.

Politicians would not find in public employment any opportunity for "spoils" were not public wages materially higher than private wages. Neither would labor unions strive for political power nor be in a position to resist labor-saving improvements in public works, were it not for these higher wages and better conditions of employment. An equalizing of public with private wages would probably restore the "businesslike" administration of earlier days and of foreign cities. But universal suffrage and fair wages, which indeed underlie "spoils" and "make-work" politics, are in themselves a sign of improvement and progress. Consequently, they are not to be touched. The alternative is to elevate private wages to the level of public wages. This is the program of economic reform. It is set forth particularly by two schools of radical reformers, the single-taxers and the socialists.

The single-taxers would raise wages by abolishing all special and monopolistic privileges. These privileges, in the hands of a few, force the wages of all laborers (unless they themselves in turn are protected by some special privilege) down to the level fixed by the necessities of those who work under the worst conditions. The monopolists reap the surplus above these necessary wages in the form of monopoly profits and rents. Abolish these special privileges, turn over the profits and rents to the working community in the form of taxes and free services, and the laborers will then have free and equal access to the monopolized opportunities of nature and society. Their wages will not be forced to a minimum of subsistence but will be augmented by the enormous rents which now go to privileged classes. Accepting this line of reasoning the single-tax philosopher holds that there would no longer be any pressure for public employment more than for private employment. Economic conditions would be so favorable that private employers could pay as high as the public. Laborers would not then ask that the public should pay higher wages than private employers, and the present differences between the two would be discontinued as being one of the special privileges which should be abolished. Consequently there would be no longer any need of "civil service reform," which is based on the surplus of public over private wages.

Admitting the strength of this economic argument, the single-tax view overlooks facts of a political and administrative char-

acter. (1) No matter how high private wages may rise, it is always possible by mere act of legislation to place public wages at a higher level. And there is no guarantee in the single-tax theory that the political influence of laborers or of cliques of laborers would not continue to exert itself towards high public wages. There might be no temptation to "make work" when private work is abundant. But that is not all. There might still be a temptation to keep public wages higher than private wages, and this would in turn lead to a temptation to make public employment more abundant than private employment. (2) The single tax regime is in the future. Spoils politics and "make-work" politics are in the urgent present. Economic reform comes through legislation and administration. This is politics. Politics is the doorway even to the single-tax. If politics is vitiated by spoils and bribery, then the very doorway to economic reform is blocked. Even from the standpoint of the single-tax it might be argued that a diseased body requires unnatural medicine to restore it to a point where it can assimilate its natural food. Civil service reform may be medicine to be taken in sickness, single-tax the food to be enjoyed in health.

The socialist reform goes still further. If all private employment is abandoned and all laborers are public employees, then of course the differences between the two are obliterated. If all laborers share the advantages of improved machinery and invention instead of seeing these diverted in the first place to capitalists, then, of course, laborers will not resist the introduction of labor-saving devices. Furthermore, by means of experiment stations, like those which the government now sustains as an aid to agriculture, the inventive geniuses of the country under socialism would find the largest encouragement for their gifts. Socialism, certainly, would entirely abolish all the force in the existing resistance by labor unions to labor-saving improvements in public employment.

But socialism is even more remotely future than the single tax; and the existing political evils require an emergency remedy. This remedy must be administrative. It must deal with the evils as we find them. It must not be delayed until the body-politic is so corrupted as to make any remedy whatever hopeless. Moreover, socialism as an economic proposition is unanswerable. It is the simplest truism to say that all economic inequalities will be

wiped out by a system that wipes out all private property. Economic inequalities are nothing but property inequalities. The problem is not in the economic field. Socialism's weakness is administrative. In fact, the only problem of socialism is the administrative problem. Even under socialism some jobs and offices would be more desirable than others. Certain children must be educated for high and responsible positions—others for the labor service. The school question will turn entirely on the question whose children are to get the higher education? The industrial question will be, who is to work in the offices and who in the vats and ditches? These are administrative questions. Factions, cliques, parties, bosses, will decide them. They are exactly the questions which are now being partially met by civil service reform and other administrative measures. Unless these administrative problems first find some kind of a working solution which will place the highest abilities in the highest positions and will rigidly exclude the political power of rings, combines, unions, bosses, and all shrewd manipulators of government, then socialism will begin upside down. Let socialists first solve the administrative problems of public industry and their economic problem will solve itself. I do not say that the administrative problems are soluble. I only say that they are the first problems to be solved. To them we must give our first attention. To solve them is really to solve the economic problems that follow.

ADMINISTRATIVE REFORM NEEDED.

We are dealing with the administrative question only in so far as it affects the introduction of labor-saving inventions. The resistance to such inventions comes from outside the department as well as inside. It comes from the politicians who want spoils and from laborers who want jobs. We have to consider the subject under three headings. First, the general policy of the department as to improvements. Second, the policy toward employees. Third, the policy toward outsiders.

COMPARISON OF COSTS SHOULD BE FACILITATED.

In the first place the program of a municipal department must always relate to the progress of industry in general. If municipal employment can frequently be compared with private employment, this relation can be accurately maintained. If,

further, the public authorities can readily change from one kind of employment to the other as soon as one shows a gain over the other, then an automatic check is created which holds each up to the mark. Such a check is possible where the municipal work is not a monopoly. In such cases it should be left open to the authorities to adopt either the contract system or direct employment. State laws should not at this point restrict local liberty. If it is possible at any time for the administration to turn to the contractors for the execution of work, it will be unlikely that any defect in municipal employment will grow beyond narrow limits. The fact that a considerable portion of the public work is being done at the same time by contract and in contrast with public employment, furnishes the safest basis of comparison and popular criticism. The two systems thus hold each other in check. Contractors cannot repeatedly demand exorbitant prices nor unload inferior work, if the city has the option of direct construction; nor can the city long continue a useless staff of idlers or out-of-date machinery, if contractors are at hand and ready and eager to do the work at lower prices. An automatic safeguard is found in submitting every job to the bids of contractors, reserving the right to adopt municipal construction and operation in case the bids are not satisfactory. The contractors should be required, of course, to submit their bids on the basis of the rates of wages paid by the municipality, the enforcement to be in the hands of the inspectors and the heads of departments, the same as the enforcement respecting quality. With such safeguards as these, the laborers in public employment will be compelled to justify their system by the solid test of results, and the results will not be left to chance nor guess, but will be accurately measured in dollars and cents.

The foregoing applies only to those public works which are not monopolistic in character, such as paving, sewer construction, and pipe-laying. These may be constructed now by the city, now by the contractors. But in monopolistic work, or in proportion as the work must be exclusively private or exclusively public, a different set of conditions comes into play. This is the case in such work as street cleaning and sprinkling, garbage disposal, the operation of water, gas and electric light plants, telephones and street railways. Here the automatic check is excluded. Of course there always exists the ultimate choice of turning from private to public or from public to private employment at the end

of a period of years, provided the existing method is unsatisfactory. But such a check is uncertain. Is there not a more direct and certain stimulus upon the authorities to introduce complete equipment of new machinery and processes as rapidly as they are invented and perfected? The answer again must be relative. It must refer to what the contractor would do were he the manager, and it must be remembered that the enterprise is a monopoly. The contractor is not compelled to introduce improvements in order to undersell, or, at least, not to be undersold by his competitors. He has the field to himself. He is not compelled to reduce his prices and therefore is not compelled to reduce his cost of production. The history of private monopoly abundantly shows that, except as threatened by competition, improvements are not introduced with the same degree of energy as in competitive business. It is competition or the fear of competition—actual competition or "potential competition"—that alone can be relied upon in private business to drive out the old and put in the new machinery. In this respect public monopoly shows no disadvantage compared with private monopoly. In the introduction of labor-saving machinery it cannot be said that monopolistic business, whether in public or in private hands, has as yet advanced as rapidly as competitive business. In lieu therefore, or in anticipation of the economic reforms mentioned above, administrative ingehuity must meet the existing situation. If the automatic check cannot be devised, there can at least be maintained a statistical comparison of costs with similar industries in other cities or states. This will furnish the basis for an enlightened public opinion which can hold the authorities to account. Such a comparison of costs requires a comprehensive and accurate system of accounting and statistics, and this can be provided only through a central supervising board.

STATE SUPERVISION RECOMMENDED.

The successful operation of all the foregoing and following suggestions for improving the quality and reducing the cost of public employment, turns first of all upon accurate and uniform methods of bookkeeping. As long as contractors have one method and municipalities another; as long as different municipalities have different methods; as long as the state has still further differences; there is no reliable basis of comparison. The automatic

check of contractor upon municipality and municipality upon contractor cannot be maintained unless the accounts of the two are kept alike and are open to the public. Likewise the system of sharing the savings, to be mentioned below, cannot be operated without public accounts carefully arranged so as to exhibit accurately the units of product and cost, in order that the departments of one city can compare their own operations with similar departments of other cities.

Uniform conditions of this kind must be prescribed by one authority, the state. A state municipal board like the Local Government Board of Great Britain, is indispensable for any lasting success and improvement in public employment. Similar boards, but with narrower powers, have been created in several American states, notably, Massachusetts, New York, Ohio and Wyoming. Full account of these and their powers cannot be given here. Suffice it to say that such a board should be composed of experts. These should receive adequate salaries and hold their positions for an indefinite tenure. To avoid political influence and to be certain that a large part of the high salaries would not go to the political managers who control appointments, the appointments should be made only on the nomination of a body of fellow experts like the Actuarial Society of America, the American Institute of Electrical Engineers, and the American Society of Civil Engineers. These bodies might nominate on occasion of vacancy each a list of three, from whom the governor should select one. In England the British Association of Municipal and County Engineers has instituted "pass examinations" of candidates for the offices of municipal engineer and surveyor of district councils. These examinations are conducted by five members of the Institute for Civil Engineers, a non-official body corresponding to the American Society. From the list of those who have passed these examinations, the smaller cities have learned to select their engineers, the larger cities having continued to hold their own stringent examinations.

The services of a state consulting engineer should be required by law to be given to all local governments upon all matters of public improvement, such as water works, lighting, roads, streets and transportation. His approval upon engineering problems would be necessary before a large undertaking could be inaugurated. The state boards of health in Massachusetts and New York

already possess this power in the case of the sanitary arrangements of waterworks and sewers. The state municipal board should possess the same power in the case of the electric, civil and mechanical engineering features of public enterprises.

There is also needed a state accountant as a member of the municipal board. He should prescribe a uniform system of bookkeeping for all departments of government in the state and in the localities, and for private corporations on public work. Such an officer has already accomplished important improvements in the local finances of Minnesota, the Dakotas, and, especially, Wyoming. Under the guidance of the engineers, this accountant could specify uniform schedules for all items of construction, repairs, maintenance, interest, depreciation, taxes, quantities and cost of material, and every element which is pertinent to a full understanding of the financial operations of public employment.

The municipal board might have power to enforce the law regarding wages, hours of labor, and to appoint inspectors. Above all, its great usefulness would be found in the publication of comparative statistics and data of all the municipalities and private corporations under its jurisdiction. If these tables are reduced to the comparative cost of the standard units in the different departments, it becomes an easy matter for the citizens of one city to learn whether their public departments are keeping pace with the departments of other cities. If the comparative costs are exceptionally high, the department will be obliged to explain. If they are low, the department will achieve honor and strength in the community. The public will be accurately informed, no evasions will succeed, and public opinion will work its certain remedies.

This policy has proven brilliantly successful in Great Britain in the electric lighting industry. As this industry is a local monopoly, comparisons can be made only between enterprises, whether public or private, in different cities. This is done through the British Board of Trade which has minute supervision over all these undertakings. The board prescribes the forms of bookkeeping and the unit of comparison. It then reports annually for each plant upon costs, charges and profits per unit of product. Costs are analyzed into "cost of labor," "cost of distribution," "taxes," "management," and "miscellaneous." In this way any citizen in any city can note in a moment's study the comparative standing

of his own city in economy and efficiency. It is not too much to say that the present unanimity of British cities in working toward public operation of electric lighting is immediately grounded on this scientific publicity of accounts.

RENEWAL FUNDS SHOULD BE ESTABLISHED.

It is not enough that a public department should be eager to adopt improvements; it must also be financially equipped for that purpose. If the department is compelled to go to the municipal council or the state legislature for an increased appropriation whenever it wishes to substitute a new invention for an out-of-date machine, it must be able to prove the advantages to be gained. The legislative branch has demands from all sides. It cannot appreciate the minute needs of every department. It is not aware of the technical progress of the industry. It knows only the political interests that are clamoring for appropriations or are demanding retrenchment. Consequently an administrative department which is always at the mercy of the legislative department in the matter of improvements is badly handicapped. Its appropriations come irregularly or not at all. It cannot look ahead and plan for definite lines of improvement.

To meet these obstacles to improvements there is but one secure device. Each industrial department should be guaranteed a fixed depreciation fund or renewal fund which should be placed to its credit yearly as an accepted part of its revenues. This fund should be computed as a percentage of the capital invested. The rate per cent should vary with the character of the industry. In the waterworks department where but little progress is being made and machinery is of long duration, a fund of one or two per cent is adequate. In electric departments, with a flood of inventions every year, five per cent is not too liberal. Let this fund be placed at the disposal of the department in addition to repairs and maintenance, for the distinct purpose of substituting improved machinery for antiquated machinery. The fund is received annually and can be accumulated if necessary against a wholesale substitution at some future date. At any rate the department is free in its disposal and need not appeal to the legislators for their amateur judgment on this matter of expert detail. If the department is one which is supported by fees and charges paid by consumers, like water, gas and electricity, then the renewal fund should be

met out of the charges, exactly like the fund for maintenance, wages and repairs. The consumers would thus provide themselves with an up-to-date plant and steadily-decreasing costs of production. If, on the other hand, the department is supported by taxes, like street cleaning, garbage disposal and sewerage, then the renewal fund should be met out of the taxes. In either case the department would realize that it had a permanent fund for the express purpose of labor-saving and quality-raising improvements, and that it need not resort to the ungracious task of persuading the legislature and irritating the labor unions by an annual agitation for new machinery and devices to reduce the expenses of production. Whether or not a department could be trusted to use a fund of this kind depends on other administrative questions to be discussed below. Such funds are generally required in the model public departments of European cities and are one of the conditions of their success. To require them also in American cities and public undertakings is one of the administrative reforms precedent to keeping pace with the technical progress of industry.

METHOD OF INTRODUCING IMPROVEMENTS.

The employees within a department do not object to labor-saving improvements, provided they do not lose their jobs. From their standpoint, therefore, labor-saving improvements should be so introduced as not to lead to the discharge of old employees, but rather to obviate the employment of new ones. This is easily provided for if advantage be taken of the extensions of the system. Almost every public department is growing rapidly in size. This ordinarily requires additional laborers. If labor-saving inventions are introduced at the time of expansion, then the harshest side of unemployment is avoided. The old employees with the new devices execute a larger quota of work, and the cost per unit of product is reduced. Complaints of displaced employees are not brought against the department and there remains only the disappointment of the outsider to be faced.

INDIVIDUAL REWARDS TO BE INSTITUTED.

But it is not enough that employees merely suffer improvements to be made. They should also eagerly promote improvements. By this is not meant that the progress of a department is measured by

the inventiveness of its employees. There is no business, public or private, where the main inventions are made by those engaged in the business. Inventions come from outside. And it is the prospect that the administration will adopt their inventions when made that stimulates inventors everywhere. A progressive public department is one that adopts inventions promptly when their worth is demonstrated. Whether the department adopts them or not depends upon the standards of economy and efficiency, and the legislative appropriation. With a definite renewal fund at hand there could be little doubt of their prompt adoption.

But while inventions come from outside, it is at the same time possible to arouse a spirit of inquiry and to stimulate ingenuity within the department itself. A system of rewards both for administrative and for mechanical improvements, under the careful management of a board of inquiry within the department is of general application in every branch of public work. It is not to be expected that a large number will win rewards. Originality is a rare gift. But the fact that the reward is offered, that it is certain to be awarded by a board of fellow employees after judicial inquiry, is a keen stimulus to all the orginial minds that may happen to be in the department. It appeals to both the love of money and the love of honor.

SHARING THE SAVINGS.

But this is not enough. Rewards for inventions appeal to the few. The overwhelming majority must find their rewards in the ordinary course of their work. Even the rewards for ingenuity and the adoption of labor-saving improvements from outside will be resisted if the employees in general do not see that they also are benefited. In order that the entire department may be keyed up to the search for improvements, it is necessary that a general system of rewards applicable to all be adopted. Such a system is to be found in a proper application of profit-sharing. Profit-sharing in private industry has been found to work decided economies. Mr. Allen Ripley Foote has strongly advocated its extension to the employees of all corporations operating on public franchises.[1] The principle is equally applicable to all public works and to all enterprises operated directly by public employment. In this case, however, there are no profits as usually defined to be shared, because

[1] See "Municipal Public Service Industries," Chicago 1899, pp. 71–74.

the municipality is working for itself and may even be charging consumers a price so low that deficits instead of profits are regularly incurred. In street cleaning and garbage disposal, no revenue whatever is earned. It is necessary, therefore, to adopt a parallel device, and to share the *savings* or *economies* instead of the profits. How this can be done is a matter of experiment, but the following suggestions may indicate lines which experiment might take.

In all cases accurate measurement of the unit of product is required. This may be the number of tons of sweepings, or of garbage hauled and disposed of during the year in proportion to the number of employees, *i. e.*, the unit in this case is the number of tons per capita—per employee. In street paving and sewer construction, the unit would be the area or length constructed per capita. A similar measurement is easily arranged for water supply, gas and electric lighting, street-car transportation and so on. Different departments already have determined upon these units or they can readily do so by proper investigation. Where a piece of work is not divisible into units, it can be taken as a whole.

Having determined the unit of product, the cost per unit is obtained at the completion of the job or at the end of the year. This cost includes all the expenses for wages, repairs and maintenance, omitting payments for material, insurance and fixed charges. The actual labor cost thus ascertained is compared with a *standard cost* in order to discover the savings or the losses. This standard cost may be established in different ways for different kinds of work. In the case of continuous work it may be the average cost of the preceding five years. In the case of occasional work and work which cannot be divided into units, it may be the engineer's or the architect's estimates, or it may be the lowest bid of contractors. The difference between this standard cost and the actual cost is the savings or the losses of the department.

How shall the savings or losses be shared between the emyloyees and the officers? Certainly the losses should not be shared. The daily or yearly wages should be in all cases the minimum from which no deductions are to be made. The *loss of the savings* is enough penalty for the failure to make a saving. It is not penalties but rewards that must be relied upon to stimulate improvements. The savings should be distributed in the simplest way possible. The municipality should gain one-half of the savings and the other one-half should go to the department. It

should then be divided among all officials and employees from the head of the department to the casual employee in proportion to the wages and salaries actually received.

Three results will follow from such a system of sharing the savings. (1) The entire department from head to foot will set itself against the injection of additional employees as long as the existing staff can do the work. (2) Each employee will be an inspector of his fellow workmen, and the shiftlessness of one will be condemned as an injury to all. (3) Labor-saving inventions and machinery will be welcomed and the employees will heartily approve the additional rewards which go to those of their fellows who invent improvements.

CIVIL SERVICE REFORM.

As already noted, the two classes of outsiders whose resistance to labor-saving improvements is most effective are politicians and labor unions. The politicians oppose whatever lessens their patronage. If the number of offices and jobs is diminished, they have a diminished bribery fund to support the "organization." But, for this same reason, they do not favor a large number of positions if they are not permitted to name the occupants. Consequently, civil service reform, by merely taking the appointments from their hands, strikes at the root of their longing to burden the department by useless incumbents. This is not a matter of hypothesis; it has been fully proved by the experience of the federal civil service.[1] Civil service rules have lessened the demand from politicians for spoils, and, having lessened the demand of the politician, they have, of course, by so much lessened the pressure upon the heads of departments against introducing labor-saving machinery whenever possible. They have checked the politician—the first stubborn opponent of improvements.

But the labor unions are not so easily convinced. Civil service rules do not reach the peculiar motive that animates them. The unions do not strive to reward particular laborers, as does the politician, but to reward labor in general. They want an increased demand for labor, not a berth for a certain "worker." Wherever in the past the unions have espoused the cause of a favorite and have urged him upon the authorities for appointment, the unions have gone to pieces. A close alliance of politi-

[1] 14th Rept. C. S. C., p. 13, 14.

cians and unions destroys the latter. For this reason the unions should be grateful in so far as the civil service rules have broken down the alliance, seeing that the rules do not stand in their way on the point of "making work." Incidentally the unions may advocate a preference for union labor in public employment, and, in so far, may countenance an infringement of the rules, but this is apart from their main object—which is to increase the demand for labor in general. Against this demand the civil service rules bring no effective check.

DIRECT TAXATION.

From the standpoint of labor-saving economy it is unfortunate that universal suffrage is not accompanied with universal direct taxation. The federal departments are supported from taxes on consumption, and, though laborers may pay more than a fair proportion of these taxes, they do not appreciate the burden compared with abundant opportunities for employment in the departments. In municipal departments the system is even more indirect. Municipal taxes are not levied upon income or consumption but upon property. The laborer, if he pays, pays not as a laborer but as a property-owner. The argument indeed, is often advanced by representative workingmen that they are really paying local taxes in the form of house rent, but, curiously, they bring forward this argument at times when they are advocating higher taxes to increase public employment and pay higher wages. In British cities, as is well known, local taxes are levied in the first instance upon occupiers, and this means that every workingman who can pay rent knows the burden of taxes. Whether his "rates" are shifted ultimately to the landowner in lower rents is immaterial. Such shifting requires several years and can be noted only when the rates make a permanent change in one direction. The yearly changes up and down are not shifted. And it is the yearly changes which attract attention. These are the basis of judgment upon the municipal authorities. These are the concrete arguments at election time. With such a union of taxpaying and suffrage, the British cities are strongly fortified against extravagance. The working classes who are the first to demand high wages in public work and to favor a "make work" policy, are also the first to feel the pressure of the resulting expense. Under such circumstances it is highly to the credit of British cities that the "fair wages"

movement, even on a low scale, should have gained wide acceptance. For the same reason, it is no surprise that the other branch of the labor policy, the effort to "make work," should have gained no hold with the access of universal suffrage. Those cities are in a favorable position for adopting all labor-saving devices as rapidly as they appear, and it is only the general conservatism of business methods in England that can operate differently.

In American cities it is probably impossible to adopt a universal tax-paying qualification. Even in England the "rates" on occupiers are wholly unpopular and only the hereditary power of the landlords in Parliament stands in the way of substituting taxes on ground rents. This is the avowed policy of municipal councils, like those of London and Glasgow, and the same policy will surely force itself upon Parliament. From the broader standpoint of justice, the American policy is preferable to the existing British policy. Taxes should be paid by the property interests which, being protected against competitors, are benefited by municipal progress, and not by the labor interests which, being open to the crowding of new competitors from everywhere, are kept down to the subsistence level. The ground-rent policy of London and Glasgow with the abolition of rates on occupiers is in the line of democracy, and should be accepted at once as a permanent condition on which administrative policy should be constructed. Administrative reform must look to other checks and balances to secure labor-saving improvements rather than to direct taxation upon the laborers.

REPRESENTATION OF INTERESTS.

The exact administrative problem is this :—How can the head of the department, where votes are universal and taxes are indirect, be free from the pressure of laborers against labor-saving improvements? Up to this point we have surveyed only the boundaries and approaches to the problem. We have seen that the department should be furnished with an accurate comparison of costs under state supervision; that it should be provided with an improvement fund free from petty interferences from the legislative branch; that improvements should be introduced at the time of making extensions; that employees should receive individual rewards for inventions and a share of the savings from reduced costs; and that politicians should be kept off by civil ser-

vice rules. All of these devices are in a sense negative. They only clear the ground. They make way for improvements but do not guarantee that improvements will be made. On the other hand the positive side of the problem is in the head of the department. Here is the key to the situation. Here alone is the choice made as to where, when and what economies shall be adopted. How can an official be chosen and kept at the head of the department who will be sufficiently independent of the labor vote on which his office depends as to promptly adopt labor-saving improvements in the face of that vote?

We know the method by which private employers force improvements upon their employees. Unions are not successful there in resisting labor-saving machinery, because the self-interest of the employer is actively aroused against them. He resorts to lockouts or he courts a strike rather than accept the backward position where out-of-date machinery would place him. Consequently the unions must admit the machinery, and must direct their efforts rather to fixing the wages of the machine-tenders. But in public employment there is no definite self-interest of the employer to resist the unions. Rather his interest is in the opposite direction—to get the labor vote. Hence not only does he pay high wages but he strives to make places. Is it possible, then, to put at the head of municipal departments men whose self-interest is to resist the unions in their reactionary demands? Can there be erected a counterpart to the private capitalist where we do not have the private capitalist's independence of the labor vote?

The problem is indeed a difficult one and cuts to the very heart of self-government. We may approach it by asking first, can a single-headed department be free from such outside pressure? The answer is certainly, No. If the single head is elected by popular vote, he requires a majority or a plurality to be elected. This means that he must be a compromise candidate. There is no single interest in any city which is large enough to risk alone the election of its leading spokesman. Organized labor is less than half of all labor. Unorganized labor is hopelessly divided. Property owners are interested according to the character of their property—some in favor of speculative real estate which needs public expenditure; some in favor of saloons and amusement property which needs exemption from state laws; some in favor of property already burdened with taxes without these other com-

pensations. There are also race questions, religious questions, amusement questions, which divide and cross-divide the voters. With such diversity of interests only a compromise candidate can be elected at popular vote—a candidate who represents no particular interest, but stands only for a shifting manipulation of interests. He has no definite policy regarding improvements, except that he certainly does not want improvements to alienate votes. Moreover, he is not a permanent officer and cannot plan for years ahead.

The situation is not different where the head is appointed, provided he be appointed by a mayor or a council which is in turn elected by the plurality or majority method. His tenure now depends upon the tenure of his superior. He is not permitted to take a stand which will disaffect a substantial group of voters. He is a compromise simply because his superior is a compromise.

The solution of the difficulty lies in a representation of interests. This is possible only when the head of the department is a board or commission corresponding in number to the number of interests in the city. If, in such a board, each municipal interest elects its own representatives, in its own way, without interference or influence from other interests, there would be no compromise candidates. It would be necessary for the business men to elect by themselves a representative business man. He would probably be one who could by no means win a popular election. The labor unions should elect by themselves their heads—the men whom they now elect as presidents and "business agents" or "walking delegates." The other interests of the city, if they also held their separate elections, would also elect their true spokesmen. As to the mechanical details in the election of a commission of this sort, these have been adequately worked out in the Swiss and Belgian systems of proportional representation. The term "proportional" however, does not clearly designate the system. It should more properly be designated as representation of interests under universal suffrage. With such a system it is immaterial whether the head of each department be a commission elected at large, or whether a single large commission—a municipal council—be elected at large for all the departments. In the latter case a technical or professional expert would be placed as the single responsible executive head of each department, without any discretion in matters of wages, hours, labor-saving economies, enforcement of contracts,

or any policy on similar subjects which might provoke a clashing of popular interests. His business would be solely to execute the will of the commission or the council which selects him. All questions of class interest would be settled in the legislative body at the head. In this body would be argued out between the labor leaders and the taxpayers' leaders the problem of labor-saving improvements. If the labor leaders could sustain their case against the taxpayers' leaders, then the improvements would be subordinated to the demands for more jobs. If not, then the economies would be introduced. The representative body would be as nearly like an arbitration court of capitalists and laborers as political conditions would allow. On the one side would be the delegates of the laborers—on the other side the delegates of the taxpayers. With equal voting powers there would also be the delegates of interests less vitally concerned in the questions at issue. These would ordinarily hold the balance of power. The decision would harmonize the clashing interests, would protect both laborer and taxpayer and permit no tyranny of one over the other. Reliance could then be placed upon the labor leaders to accept the policy of progress and labor-saving improvements. They could not dodge the issue nor bring pressure to bear upon officials outside the hall of discussion. They could not hold up the labor vote as a threat, because those whom they threaten owe nothing to that vote. The legislative head of the department thus elected would also be a continuous body with the same men elected year after year, and a policy of improvement once entered upon would be uninterrupted. This of itself, with the extensions of the department, would both aid in furnishing more jobs and in securing more labor-saving improvements.

SUMMARY.

We have now examined in detail the advantages and disadvantages of public employment in promoting improvements under democratic suffrage. We have seen that in the extension of the service and in the improvement of quality public employment has an advantage over private employment, because in these directions it gets votes. But in the reduction of expenses, especially through labor-saving inventions, votes are not gained and even are alienated. Consequently the serious problem of public employment with universal suffrage is the progressive reduction of expenses. We have seen that, of the remedies for this resistence

to labor-saving inventions, exhortation is temporary and partial, based on ignorance of economic and administrative conditions. We have seen that sweeping economic reforms, though ultimately they would leave no problem whatever as we know it, are nevertheless remote, while the urgency is present, and, more to the point, they themselves cannot be reached until after the disappearance of the very corruption for which they are proposed as remedies. We conclude, therefore, that in the immediate present the problem is one of administrative reform ; and that administrative reform is such a rearrangement of the general policy of the department and of the treatment of the employees and outsiders as will create a new self-interest of assistance to improvements which will counteract the old self-interest of resistence to improvements. But finally we must bear in mind that it is the merest truism to hold that back of all reforms there must reside a fund of patriotism and public spirit. It is only because we have evidence that such a fund already exists in abundance and only waits to be liberated, that we can place such emphasis on the mere machinery of administration. The secret of administrative reform is not primarily to create a public sentiment, but, like the engine which guides the steam, to provide organs for concentrating the sentiment that is now at cross purposes.

SHALL SAN FRANCISCO MUNICIPALIZE ITS WATER SUPPLY?

By A. S. Baldwin.

San Francisco enjoys the distinction of being one of the few large cities of the world whose water supply is obtained from a private corporation. This fact is being used in the nature of an argument in favor of municipal ownership. The advisability of municipal operation is, however, a local question to be determined not by general statements or conditions elsewhere, but by local considerations and by the relative advantages of this or that system. It is essential, therefore, to examine the present supply, to ascertain whether it is adequate, whether the water is pure, whether the rigid municipal control provided for by law sufficiently protects the consumer, and whether a municipal supply would be superior to the present private supply.

PRESENT SUPPLY ABUNDANT.

The provision of an adequate water supply was from the first essential to the development of San Francisco; without it, there could have been no metropolitan city. Water from wells, transported in water carts and sold at from five to ten cents per bucket, was the only supply for some ten years after the rush of gold hunters to the new El Dorado had made San Francisco a city within a year. The expense of obtaining a permanent water supply was so great that it is not surprising that the city grew to a population of nearly 80,000 before any decisive step was taken towards forming a water company.

During the year 1860, a corporation known as the Bensley Water Company commenced conducting the water from Lobos Creek by means of a flume and pipe line through the Presidio Reservation to a pumping station near Black Point, where it was pumped into the Francisco street reservoir at an elevation of 140 feet and the Lombard street reservoir 300 feet above the city base. The water obtained from this source yielded a supply of

nearly two million gallons daily, which, although enough for that day, soon did not meet the requirements of the rapidly increasing population. Hence the idea of organizing a new company was suggested to some of the leading capitalists, who shortly afterwards formed the present company—the Spring Valley Water Works.

This company purchased in 1863 a tract of land in the mountains of San Mateo County, about 17 miles south of San Francisco, at an elevation of about 690 feet above the city. A small reservoir was constructed in the upper portion of Pilarcitos Valley, and a conduit built therefrom to San Francisco having a total length of thirty-two miles. The water in this conduit emptied into Lake Honda reservoir—capacity 33,000,000 gallons—, from whence it was distributed by gravity to various parts of the city. But the population grew so rapidly that hardly had this system been completed before an additional supply was necessary.

About the beginning of 1865 the two water companies, the Bensley and the Spring Valley, consolidated. But it was evident that the combined resources of both companies would soon become insufficient to supply the demand. The annual consumption of water rose from 864,000,000 gallons in 1865, to 1,348,000,000 gallons in 1867. Large reservoirs were constructed in the San Mateo mountains, including the Pilarcitos reservoir, since extended and now holding 1,050,000,000 gallons, and the San Andreas reservoir with a capacity of 6,000,000,000 gallons.

In the early seventies, anticipating the growth of the city and the increased demand for water, the company purchased another water-shed of twenty-three and one-half square miles in Crystal Springs Valley. Since that date other streams have been impounded, and at present it is the intention of the company to build a large dam across Alameda Creek, some 250 feet high, thus creating a reservoir having a capacity of from 30,000 million to 40,000 million gallons. By these means the company is prepared to provide San Francisco whenever required with a daily capacity of 100,000,000 gallons of water, a supply adequate for a population of 1,000,000, (the present population is about 360,000).

PURITY OF SUPPLY.

Few cities of the size of San Francisco can boast of as good a quality of water. The most recent authority upon this subject is

a leading physician, Dr. Chas. N. Ellinwood. In a lecture delivered by him on February 16, before the Cooper Medical College, he said:

> It may not be known to many of you how the quality of our Spring Valley water is improved and purified by its manipulation, by screens and aeration processes and the agitation and pressure to which it is subjected in traveling its many miles of pipes and conduits before it reaches the consumer. * * Water drawn from the faucet in Cooper Medical College laboratory shows from 300 to 400 bacteria in the cubic centimeter, and this is a fair average of the purity of water throughout the city, and compares very favorably with the water supply in the most favored cities in the world.

MUNICIPAL CONTROL OF WATER RATES.

Thus it is evident that the existing supply is both adequate and wholesome. Indeed, company management is never criticised upon that score. Further, the city has a very strong control over the company in that it has the power to fix the price charged for water, subject only to review by the courts as to whether the rate so fixed is reasonable.

The granting of this power dates from the organization of the first company. Section 4 of a general act passed in 1858 provides:

> All corporations formed under the provisions of this Act, or claiming any of the privileges of the same; shall furnish pure, fresh water to the inhabitants of such city and county, or city or town for family uses, so long as the supply permits, at reasonable rates and without distinction of persons, upon proper demand therefor, and shall furnish water, to the extent of their means, to such city and county, or city or town, in case of fire or other great necessity, free of charge. And the rates to be charged for water shall be determined by a Board of Commissioners, to be selected as follows: Two by such city and county, or city or town, authorities, and two by the water company; and in case that four cannot agree to the valuation, then, in that case, the four shall choose a fifth person, and he shall become a member of said Board; if the four Commissioners cannot agree upon a fifth, then the Sheriff of the county shall appoint such fifth person. The decision of a majority of said Board shall determine the rates to be charged for water for one year, and until new rates shall be established. The Board of Supervisors, or the proper city or town authorities, may prescribe such other proper rules relating to the delivery of water, not inconsistent with this Act and the laws and Constitution of this State.

This act remained in force until the adoption of the new state constitution in 1879. Being a statute, it was, of course, subject to amendment or change by the legislature. Thus, when the constitutional convention met to frame a new constitution, the members considered it desirable to establish by constitutional provision the board or commission that should fix rates for the supply of water, and thus render the provision of law in that respect possibly more permanent in its character, or at least unchangeable

except by the will of the electors of the state. For, once being made and adopted as part of the constitution, it is not subject to alteration and amendment except by a proposal to amend, carried by a two-thirds vote of all the members elected to each of the two houses of the legislature, and then approved and ratified by a majority vote of the qualified electors voting on such amendment.

The constitutional provision enacted in 1879 and now in force provides:

ART. XIV, Sec. 1. The use of all water now appropriated, or that may hereafter be appropriated, for sale, rental, or distribution, is hereby declared to be a public use, and subject to the regulation and control of the state in the manner to be prescribed by law; provided, that the rates or compensation to be collected by any person, company or corporation in this state for the use of water supplied to any city and county, or city or town, or the inhabitants thereof, shall be fixed, annually, by the board of supervisors, or city and county, or city or town council, or other governing body of such city and county, or city or town, by ordinance or otherwise, in the manner that other ordinances or legislative acts or resolutions are passed by such body and shall continue in force for one year and no longer. Such ordinances or resolutions shall be passed in the month of February of each year, and take effect on the first day of July thereafter. Any board or body failing to pass the necessary ordinances or resolutions fixing water rates, where necessary, within such time, shall be subject to peremptory process to compel action at the suit of any party interested, and shall be liable to such further processes and penalties as the legislature may prescribe. Any person, company or corporation collecting water rates in any city and county, or city or town in this state, otherwise than as so established, shall forfeit the franchises and water works of such person, company or corporation to the city and county, or city or town where the same are collected, for the public use.

The intent of the constitutional convention was to give the water companies no voice in the fixing of rates, but only a right to be heard by the board or other body charged with the duty, and the section has so been interpreted by the courts. Prior to 1879, the company had the right to be represented upon the board by two members; these two members were in the minority, but still constituted a representation for the company. This plan does not appear to have been unpopular or to have caused any friction between the company and its consumers, but it was not provided for by the constitutional provision.

There have been some adjudications under this constitutional provision, but the only ones of interest are the decisions that the obligation on the part of the company to "furnish water to the extent of their means to such city and county or city or town in case of fire or other great necessity free of charge" was wholly

abrogated, and that the rates as fixed by the supervisors or other governing body must be reasonable.

Thus the protection which is afforded consumers from exhorbitant rates, is the power of the board of supervisors (the city council) to fix annually the rates charged for water, subject to review by the courts in case suit is brought.

EFFECT OF PUBLIC CONTROL.

It has been claimed by the advocates of municipal ownership that the vesting of this power in the local board creates an element of corruption in politics and enables the board to levy tribute on the water company in exchange for votes in favor of high water rates. Assertions to this effect have been made nearly every year for the past decade by the press, but in no instance have the statements been verified, notwithstanding the fact that the books of the water company are open to the inspection of every board of supervisors and to the grand juries. These continual rumors, however, doubtless had much to do with the preamble in Article 12 of the new charter of San Francisco, in which is was resolved that it was the "purpose and intention of the people of the city and county that its public utilities shall be gradually acquired and ultimately owned by the city and county."

The question which the voters and taxpayers of San Francisco now have under consideration, is whether the fixing of these rates by the board of supervisors is likely to be more demoralizing than the management and disbursement indirectly by them of millions of dollars every year, which would be the case if the works were owned by the city.

How far has this control been effective? Statements filed by the company annually for the past twenty years and published in the municipal reports, show that the company has expended in land purchases, construction of reservoirs, pipe lines and other permanent improvements about $32,000,000. The corporation is capitalized for $26,000,000, of which amount $14,000,000 is stock, the market value varying between $95 per share and par. The balance is represented by bonds (about $7,000,000 at four per cent and $5,000,000 at six per cent), which sell in the market at from four to fifteen per cent premium. The value of the company's system based on the market value of its securities is at present, therefore, $28,000,000.

These facts show that the capitalization is some $6,000,000 below the actual capital expenditures, that interest charges are reasonable and that only a fair profit is made. From the point of view of the company municipal control does restrict.

It has been stated that the cost of water ($200 per million gallons upon an average) is greater in San Francisco than in other cities. Whether such is actually the case, is impossible for me to determine. One would naturally expect it to be true even though the works at San Francisco were managed more efficiently than elsewhere, for an adequate supply is far more expensive in San Francisco. In nearly all other large cities, there is an abundant supply of fresh water immediately at hand, and it is therefore not necessary to conduct the water from so great distance as is the case with the Spring Valley Water Works. Further, in San Francisco and the vicinity, the annual rainfall is uncertain and it is necessary to store a three years' supply of water to guard against a probable water famine. The cost of fuel is also a large item of expense, the price being nearly three times greater than in many Eastern cities. These elements have been considered in establishing water rates, and I think it is the consensus of opinion that the present rates are not excessive.

Although the present supply is adequate and pure, and the water rates are generally considered reasonable, the advisability of municipal operation is being discussed.

MOVEMENT FOR MUNICIPAL OPERATION.

Shortly after the adoption of the new constitution 1879, elaborate proceedings were had by the municipal authorities toward the acquisition of a water supply to be owned by the city and county. No results were obtained beyond a thorough investigation of the water sources available and the probable cost. An offer was made on behalf of the municipality to the Spring Valley Water Works for the acquisition of its plant. A counter offer was made by the water company. While the amounts involved were not very far apart, no common agreement was reached, and the question of public ownership, with the exception of occasional discussion and limited proceedings, lapsed until the adoption of the new charter by the city and county in 1899. The charter takes up the question of public utilities with a broad and fixed

declaration, and as its provisions are in some respects new to legislation, they are quoted at some length.

ARTICLE XII.

ACQUISITION OF PUBLIC UTILITIES.

It is hereby declared to be the purpose and intention of the people of the city and county that its public utilities shall be gradually acquired and ultimately owned by the city and county. To this end it is hereby ordained :

Sec. 1. Within one year from the date upon which this charter shall go into effect, and at least every two years thereafter until the object expressed in this provision shall have been fully attained, the Supervisors must procure through the City Engineer plans and estimates of the actual cost of the original construction and completion by the city and county of water works, gas works, electric-light works, steam, water or electric power works, telephone lines, street railroads and such other public utilities as the Supervisors or the people by petition to the Board may designate. * * *

Sec. 2. After such plans and estimates shall have been procured and filed, the Supervisors shall, at as early a date as they may deem for the best interests of the city and county, enter into negotiations for the permanent acquisition by the city and county, by original construction, condemnation or purchase of such or any of said public utilities as they may regard most important to the city and county to be first acquired and to formulate and submit to the electors of the city and county, at a special election, propositions for the permanent acquisition and ownership thereof.

Before submitting propositions to the electors for the acquisition by original construction or condemnation, of public utilities, the Supervisors must solicit and consider offers for the sale to the city and county of existing utilities in order that the electors shall have the benefit of acquiring the same at the lowest possible cost thereof.

Sec. 3. When a petition or petitions signed by electors of the city and county equal in number to fifteen per centum of all the votes cast at the last preceding general election shall be presented to the Supervisors, setting forth that the signers thereof favor the acquisition by the city and county of any public utility, and requesting the board to prepare for submission to the electors of the city and county, as hereinafter provided, a proposition for the acquisition of such utility, it shall be the duty of the board to immediately take such steps or to enter into such negotiations as will enable it to formulate such a proposition for submission to the electors as aforesaid. * * * The Mayor shall also have the right to formulate and submit to the electors a separate proposition from that formulated by the Supervisors for the acquisition of the utility named in said petition. At the next municipal election after the formulation of such propositions by the Supervisors and the Mayor, the Board of Election Commissioners shall submit to the electors the two alternative propositions. The proposition receiving a majority of the votes cast thereon shall be adopted; but in case the votes cast in favor of both propositions shall not exceed one-half the total number of votes cast thereon, both propositions shall be deemed rejected.

Nothing in this section shall be so construed as to prohibit the Supervisors from responding to the aforesaid petition of the electors requesting the acquisition of any public utility by proceeding at once, without the submission of propositions to the electors as aforesaid, to pass an ordinance declaring its determination to acquire the same as provided in section six of this article and from proceeding thereafter to acquire the same in the manner hereinafter provided.

Sec. 4. * * [Instance in which cost can be paid out of taxes.] * *

In case, however, the cost of such public utility sought to be acquired under the

provisions of this article shall so far exceed the annual revenues of the city and county, in addition to the other necessary expenditures thereof, as to render it necessary to incur a municipal bonded indebtedness for such purpose, then the Supervisors, in submitting propositions to the electors for the acquisition thereof, shall specify therein the amount of the proposed bonded indebtedness, the rate of interest thereon, and whether such bonded indebtedness shall be incurred. At least two-thirds of the electors voting thereon at such election shall be necessary to secure such acquisition and to warrant the issuance of municipal bonds therefor, as hereinafter set forth.

Sec. 5. * * [Result of election mandatory.] * *

Sec. 6. * * [Due notice must be given as to meeting of Supervisors relative to purchase.] * *

Sec. 7. * * [When such meeting may be held.] * *

Sec. 8. * * [Ordinance as to election on bond issue.] * *

Sec. 9. * * [Notice of election.] * *

Sec. 10. No indebtedness shall be incurred for the acquisition of any public utility under the provisions of this article, which, together with the existing bonded indebtedness of the city and county, shall exceed at any one time fifteen per centum of the assessed value of all real and personal property in the city and county.

Sec. 11. The bonds issued under the provisions of this article shall be of the character of bonds known as serials, and shall be payable in lawful money of the United States. The Supervisors shall decide at the times of the issue of the bonds in what lawful money of the United States said bonds shall be payable. Not less than one-fortieth part of the whole amount of indebtedness shall be paid each and every year, on a day and at a place to be fixed by the Supervisors, together with the interest on all sums unpaid at such date.

* * [Provisions regarding sale, issuance and payment of bonds.] * *

In compliance with the provisions of the new charter, the board of supervisors are now inviting proposals from corporations and individuals to sell the city a water system, and numerous offers have been received. The Spring Valley Water Works in reply to the request of the supervisors, has within the past month sent a communication to them, agreeing to sell its system to the city at a price to be fixed by arbitration. The other proposition which seems to merit consideration is an offer from the Lake Tahoe Water Company, which is as follows: ·

Proposition No. 1—To construct works of a capacity of 30,000,000 gallons daily, single pipe line, for the sum of $17,600,000.

Proposition No. 2—Same as No. 1, except two pipe lines from the intake reservoir, for the sum of $20,405,000.

Proposition No. 3—Same as No. 2, except the capacity of the works above the intake reservoir to be 100,000,000 gallons daily, for the sum of $21,215,000.

Proposition No. 4—To construct works of a capacity of 100,000,000 gallons daily above the intake reservoir, and a capac-

ity of 60,000,000 gallons daily to San Francisco, single pipe line, for the sum of $29,772,000.

Proposition No. 5—Same as No. 4, except two pipe lines from the intake reservoir, for the sum of $32,660,000.

FINANCIAL ASPECTS OF MUNICIPAL OPERATION.

The questions to be decided are financial. If the works are municipalized, how will the taxpayers and consumers be benefited? What is the tax now assessed against their property by reason of the annual payment from the city to the water company for fire hydrants, flushing sewers and watering the small parks? (Golden Gate Park obtains its supply from wells). What will be the tax if the city owns the works? Will the rates to consumers be reduced under municipal ownership; and if so, will not the taxpayers have to make up the difference between receipts and expenses?

For the sake of illustrating the result of municipal ownership, I am going to assume that the city determines to purchase the Spring Valley system and that it votes a bond issue of $30,000,000[1] for this purpose, payable in forty annual instalments with interest at three and one-half per cent per annum. To do this, provision will have to be made to pay each year either from water sales or taxation as follows:

First,—One-fortieth of the principal.

Second,—Interest on the outstanding bonds.

Third,—New construction, operating expenses and taxes in counties outside of San Francisco.

At present, water rates are fixed to give the private company *first*, five per cent interest on the value of its system (about $26,000,000) and *second*, taxes and operating expenses only. Nothing is allowed for a sinking fund, permanent improvements, or the purchase of land or water rights. The company retires its bonds as they mature by issuing new ones. It borrows when it needs money for investments. Under this plan the reader can readily see that a much larger sum would have to be raised annually during the next forty years if the city undertakes the purchase and management of its water works than is at present the case. For instance, the city (through taxation) has been

[1] This sum seems to be about what would need to be expended no matter whether new works were built or those of the present company purchased.

contributing but a small amount towards the income of the water company, the main burden being upon consumers as the following table will show:

Table showing what water consumers and taxpayers have paid Spring Valley Water Works for past 9 years (1891–1899).

YEAR.	DAILY CONSUMPTION PER MILLION GALLONS.	FROM CONSUMERS.	FROM TAXPAYERS (THE CITY.)
1891	19.33	$1,516,232.54	$88,565.68
1892	19 41	1,571,612.33	85,988.13
1893	19.06	1,560,358.43	61,228.15
1894	19.58	1,555,322.05	96,846.33
1895	19.91	1,550,688.67	137,235.73
1896	21.25	1,553,152.59	213,917.73
1897	23.77	1,499,093.48	228,087.07
1898	23.95	1,490,921.55	245,165.50
1899	25.01	1,546,939.02	240,878.77

Nearly ninety per cent of the amount shown in the above table which the city pays annually to the water company comes from a charge of five dollars per fire hydrant per month. The total amount from the city amounted, during the year 1899, to a tax rate of about six cents on each one hundred dollars' valuation of real and personal property, or about thirteen per cent of the tota receipts of the company.

During the year 1899, the consumption of water in San Francisco was nine thousand one hundred and twenty-nine million gallons, and the cost of operating the system of the Spring Valley Water Works and making the necessary repairs to the plant for that year, was $444,864.59. The total income for the year was $1,903,411.85. Of this sum water consumers in the City and County of San Francisco paid $1,546,939.02. The city paid $240,-878.77 for water furnished for fire purposes, flushing sewers and irrigating the small parks throughout the city. The balance of the income was made up from water sales to vessels and from rents received from the company's lands. The actual cost, therefore, exclusive of taxes on the properties and franchises of the company, dividends to stockholders and interest on bonds, was $50 per million gallons, and the difference between this cost and the amount received, about $150 per million gallons, was applied to the payment of taxes, the interest on the outstanding bonds and dividends to the stockholders. The outlay for constructing new pipe lines, acquiring additional rights of way and the purchase of

additional real estate necessary to protect the water rights and water-sheds of the company, which in 1899 amounted to $708,430.44, was paid for out of the proceeds of the sale of bonds.

If the city could not operate its plant at less expense than the Spring Valley Water Works, and no one claims it could, what benefit would be derived from municipal ownership? There is no escaping the fact that if the city purchases the water works now owned by the Spring Valley company, or acquires any other supply, there will be a fixed annual charge to meet, consisting of sinking fund, interest, operating expenses and new construction. The total of these accounts must be provided for in two ways: first, by the sale of water to consumers, and second, by taxation on all real and personal property within the city.

Assume that the cost of operating expenses under municipal management will be about the same that it has been under the management of the Spring Valley Water Works—$500,000 per annum. Assume also that the expenditure for new construction will be about $500,000 per annum, for that amount is what will be expended by the Spring Valley Water Works to provide a supply of 100,000,000 gallons daily for San Francisco. In addition, there will be $1,050,000 in interest for the first year (interest on $30,000,000 at three and one-half per cent), a sinking fund charge of $750,000, and a loss of about $200,000 per annum in taxes by reason of the change of ownership; a total of $3,000,000. In the last year of the forty-year period, the total expenses to be met, including loss of taxes for the purposes of comparison, would be $2,000,000 and the average for the whole period would be over $2,500,000. Assuming that the income from sale of water to consumers would be the same as at present, there would be remaining in the first year a deficit of $1,500,000 and in the last of $500,000, an average of $1,000,000 to be met by general taxation. Comparing this amount with the sum actually so raised in 1899—$240,000—it is evident that a burden six times as heavy the first year, twice as heavy the last year or four times as heavy for each year upon an average would be imposed upon the taxpayers, provided the water supply was municipalized.

In other words, whereas real estate now contributes about six cents on each one hundred dollars of the assessed value every year towards the maintenance of the Spring Valley system, this being the amount charged for water supply for fire purposes, etc., under

municipal operation, the tax on real and personal property the first year of the bond issue would be increased to thirty-six cents per one hundred dollars, and the last year of the bond issue the tax would still be twelve cents on each one hundred dollars.

Of course, rates could be increased and the burden shifted from the taxpayer to the user, but there is a heavy load to be borne by someone. It arises from the fact that the city is obliged to pay not only operating expenses and interest, but sinking fund charges as well, whereas at present the users are paying only operating expenses and interest (or dividends).

As it seems to be impossible for a city to conduct an enterprise as economically as a private corporation, operating expenses will be considerably higher under municipal operation, thus materially increasing the deficit. The increase in population will probably call for larger expenditures under new construction than allowed for, but this would probably be offset by the increased receipts from this source, so that this item may be omitted. It should be borne in mind, however, that it has been the policy of city officials, undoubtedly a just one, to reduce water rates instead of to raise them, and that although the number of ratepayers and the water consumption has largely increased during the past nine years, the revenue from this source in 1899 was no larger than in 1891. Thus the burden upon the taxpayers will probably be much more relatively instead of less.

Thus I conclude that it would be unwise for San Francisco to municipalize its water supply. The city is protected by abundant and powerful provisions, the supply is all that could be desired, and financial loss would follow the experiment.

IS A THIRD PARTY NECESSARY IN MUNICIPAL REFORM WORK?

By John Jay Chapman.

The impulse that makes us wish to form a third party is a sincere one. It comes from a desire to do something useful and consecutive in politics; and our first thought is to imitate the political parties. Everyone concedes that citizens' movements are useful. Why then should we not have a continuous citizens' movement, organized in such a way as to be a permanent force in politics? We know that in order to improve our public life we must have continuity of effort. Ought we not to have continuity of formal organization?

Perhaps no man could have been wise enough to see in advance the fallacy in this reasoning, which seems so plausible; but our experience has showed us that the organization of a permanent third party is both impossible and undesirable. The reason at the bottom of this impossibility is that our true aim is a purely moral aim: we desire to benefit the community by raising the standards of political conduct. It is idle to pretend that we ought to have some more definite aim than this, that we ought to adopt some cause like Municipal Gas or Small Parks; some program that men could understand and subscribe to, some positive basis, some demand for a specific thing. As a matter of fact we are not set in motion by a desire for a specific thing. If we pretend that we want any specific thing we deceive ourselves. And we shall be undeceived, very likely, in the outcome; for we shall receive what we ask for at the price of some moral turpitude—and we shall be disgusted.

Let a man once discover, by reflection or by bitter experience, that the nature of his interest in reform politics is, at bottom, a moral—not to say a religious—impulse to do good to his fellow men, and two things will become clear to him. *First*, that the

running of independent candidates is a valuable form of political activity, and should be kept up continously until the regular parties themselves nominate men whose moral standards are as high as those of the independents. And *second*, that this putting up of independent candidates must be done each time by a group of individuals who are not themselves organized into a party, or into a club, or into anything which can be bought, threatened or controlled.

In other words, the reformers have got to live at the top notch of an initial enthusiasm. They are always at the beginning, uncommitted to particular schemes, men or heirarchies. They are always engaged in putting forth the first expensive effort that shall help them find their true friends. They can safely rely upon nothing but their cause and their activity. They must take up each campaign afresh, with no added help from the past, except the confidence which their honesty may have earned, and the experience their labor has given them.

The outlook upon endless and thankless hard work discourages many men. The persistency of those that keep at it is a mystery to most of the world, and indeed the workers get a sort of admiration for stubborn grit; for the world thinks that the men themselves must know their labor is worthless, and that they continue to do it out of desperation and habit. But the truth is that the utility of conscientious work is revealed to the men who do it. They see accomplishment where everyone else sees only failure. And the harder they work the more sharp-sighted they become as to the usefulness of just such work as their own. A man at twenty-five will hardly be content with anything less than sweeping changes in society. He believes that he can do great things in a short time. As time goes on he becomes undeceived as to the speedy nature of reform; but the very experience which teaches him that sweeping and sudden reforms are not to be expected, reveals to him the reality of those slow and not always visible changes for the better which patience and continous effort bring in. Thus the mainspring of motive in him remains as strong as ever.

I have thrown together the following suggestions as to why party organization is a danger in the conduct of moral reforms; and especially in the conduct of our own cause which is simply moral agitation in its purest form.

PARTY ORGANIZATION UNNECESSARY.

What is it that we expect to do with our party after it is formed? Surely everyone knows. We intend to run candidates for office, promote legislation, hold meetings, distribute literature, affect public opinion, stimulate public spirit. There is no one of these things which really requires party machinery. Indeed, all our reforms have hitherto been done without party machinery, and yet the idea floats in our minds, that sooner or later we must form a party. We are used to seeing all political influence housed in party organizations and have not had time to discover that effectual influence, practical power for good can come from men who have no party organization, nay from men whose public power is due to their hostility to their own party organization: witness Comptroller Coler.

Comptroller Coler has appealed to the conscience of the community and has aroused in all minds a hope, a demand, for better government. Now this demand operates on all the people at once. It tends to make the regular parties put forward good men. It raises the standards of municpal politics. But there is no way by which Coler could form a party and become the beneficiary,—reap the reward, as it were,— of the new movement which his example has started. If Coler should form a party he would be joined by some men who were self-seekers, and the public would begin to distrust him at once. Moreover, it would be said that Coler thought all the good men in the community could be separated from the rest and made to come under his banner.

INFLUENCE OF INDEPENDENT VOTERS UPON PARTIES.

A reformer who excites a desire for virtue in other men's breasts must be encouraged if these other men accept virtue wherever they can find it. They ask it first from their own leaders. If they are Republicans they demand a candidate of a higher stamp than their old candidates. They become restive under an old leader. A faction developes inside the party which protests against a Quigg or a Hess, and after a few efforts, succeeds in replacing him with a slightly higher class of man. They thus begin to purify their own party, they begin to abolish part of the iniquity that now offends them, and in this way the influence of the reformer creeps at second hand into the party organizations, not destroying them, not even threatening their

existence, but changing their character. Meanwhile the men whose activity started this ferment within the party themselves stand altogether outside of the party organization, and continue to stimulate the entire public, including the organization men, to a higher sense of public duty. These stimulators and originators of new public standards are always the most important factor in the life of a nation. They do more good than any other single factor in politics.

The charge is brought against reformers and reform candidates that they seem to think all the virtue of society is lodged in themselves. This charge is justified the instant the reformers set up an organization and ask anyone to support that organization. It is not justified if they merely put a set of candidates in the field and appeal to the public on the private character and record of these candidates. "Do not trust us," they say; "look at these candidates, and if you will not vote for them, go force your parties to put up others of as good a character."

So long as reformers in taking action upon any public matter merely call upon the citizen to support their cause on the merits, and solely upon the merits, of the matter in hand, they cannot be charged with pretending to be holy. So long as reformers ask nothing whatever for themselves, they cannot be thought selfish. "Well," it is objected, "but the mere running for office is a sign of selfishness." Not in a man who has no organization behind him. This is not thought selfish. It is thought foolish by people who do not understand the reason for it; but it is never thought selfish even by the most cynical.

PARTIES DO NOT INSPIRE CONFIDENCE.

Thus we are obliged to confess that, even if mere considerations of practical expediency were to govern us, they would be enough to make reformers abandon formal organization. In one word, you cannot get public confidence till you abandon formal organization. But there are greater reasons than this. The end which the reformer has in mind is not to govern people but to teach them to govern themselves; not to make men intrust their affairs to his guidance but to make men intrust their affairs to the guidance of honest agents. The reformer's success consists in the improvements brought into public life by his activity. It

is victory enough for him if he gets good government at all, or if he gets ever so slight a change for the better.

Do I truly care whether an honest administration of New York city comes from Tammany Hall or from the Republican party? I do not. Does anyone wish to make another party because there are not parties enough already? Surely not, but because he thinks that his new party will be a party of purity. As if everyone did not know that a party cannot be kept pure. It has never been done in the history of the world. There have been pure individuals but no pure parties. The instant a party gets a little power, whether the power of office or the power of influence, there will be some men in it who can make use of that power to promote their own private ends. Fundamentally speaking, it is a lie for you to call anything you get up a reform party. The only reform it contains will be the individual courage of the men who are in it. In so far as the other parties contain men of courage, they also are reform parties. And so the popular prejudice against the pre-emption of virtue by reform parties is founded in scientific fact.

PARTIES PRODUCE BOSSES.

There is still another and even more fundemental reason why reformers should not seek to form a party or a paper organization of any sort. The regular parties, while pretending to be representative in character, are in reality always run by a few men. The concerted action of large bodies of men is obtained by a manipulation of party machinery. In other words, the party system which reformers are asked to imitate is a fraudulent affair, which seems to record the will of the majority but really only executes the will of a few leaders. Now whatever may be said as to the theory of representative government, and whatever argument be made showing that a proper organization ought not to be a creature of its leaders, it is one of the facts of history that all organizations have been creatures of their leaders and that they have been kept in existence because they were necessary as a means of promulgating the will of a clique. The leader of a reform movement would, if he were to form an organization, be obliged to use his organization in the same way. He must go through the pretense of obeying, while he is really commanding. This bit of hypocrisy is inherent in the party idea, and the resort to it always destroys the moral influence of reformers who adopt the party idea.

WHAT COURSE SHOULD BE FOLLOWED?

If these things are true, then the practical question is how to get heard by the public without going through the pretense of forming a party. The answer is easy. It is simply a matter of doing with the hand what you propose to invent a machine to do. Put up your candidates, hold your meetings, issue your literature. You will have to do it on a small scale at first, but, on the other hand, you will get rid of all wire pulling and delay. No one can stop you from proceeding at once into action. If reformers will only be content to ask no recognition and no favor, and to give no recognition and no favor, there is no end of their influence for good, and no beginning to their power for evil.

Now it will be thought that this course contemplates at least a group of men in a town who shall take up the reforms, and that to make a beginning is hard. This is perfectly true. You have got, in any case, to assume the existence of one or two earnest men, who want, say, a reform mayor. The question is whether they shall start a reform organization to run a mayor or shall run a mayoralty candidate themselves, simply asking help from their fellow citizens. Now there is no stage of public sympathy for their movement, in which it will not be an advantage to the cause of reform for the men to do the nominating themselves. Take the case of the maximum power that they can wield. Suppose everybody in the community agrees with them. Everyone wants a reform mayor. Then why go through the superfluous formation of a party? Let the men put up an honest candidate; he will be elected. Take the minimum case. No one wants a new mayor except the two reformers. Then the men must put him up themselves and cast two votes for him. In this latter case the greatest political need of the town will be to see two independent men cast their votes for a mayor of their own choosing. The reformers will be doing the very maximum to stimulate independent voting in the town.

In the first case a party of purity was unnecessary because the people were independent. In the second case, it was impossible because the people were hide-bound partizans. In the latter case, any organization which our two reformers started would have tied their hands and suppressed their activity. The same reasoning holds true as to any intermediate condition in the reform

sentiment of the town. To individuals, few or many, who really want reform, organization is unnecessary; to individuals who want no change in conditions, organization is an anchor to windward. To individuals who fluctuate, as most men do, between two states of mind, who remain radicals during one week and become conservatives during the next, organization is a damper which deadens their moments of enthusiasm and perpetuates their moments of despair. A man's impulses towards active work are forever being checked by his party associates, and his rivulet of will is lost in a swamp of inaction. He is checked in his stride till he loses all courage and grows to believe that spirited activity is impossible in politics just because it is impossible in an organization. He is turned into a helpless and disappointed man merely because he mistook the means of reform and relied upon organizations, when he should have relied solely upon persons. The worst result of past reform organizations has been that they planted despair in the hearts of young men: and we may expect a great change for the better the instant our reform leaders shall have learned to discard formal procedure.

VALUE OF EXPERIENCE.

But note this, the first two reformers which a town puts forth do not spring up full-blown like Minerva from the head of Zeus. They come blundering into the field and reel about making mistakes. It will take these men ten years of bitter experience to learn that they must not form any organization. Therefore, when you see a man forming a Party-of-Purity, tell him only one thing: "Do not be discouraged when you find that this plan fails. This trial was necessary in order that you might discover what not to do. The next experiment you make will involve less effort, and bring better results. But this experiment was necessary."

There is no single mistaken thing that the New York reformers have done that was not necessary. We have been learning that, for our purposes, party organization was futile in practice and false in theory.

Does it not require a few years in any line of life to learn the principles of a business? And do we not always discover that the friends we make, the agents we rely on, the powers we serve must be built up slowly? The slow part of the reformer's education is to get him to see that he must rely on himself. When this

point has been reached everything begins to move quickly. For instance, as soon as your little group of independents has taken action once or twice, it becomes a recognized political force in the town. Nothing happens there which does not have some reference to the men of this group. They are constantly in the minds of all the citizens, and the politicians have to make allowance for the reform element by omitting some traditional villainy.

The mobility and light-armed activity of the reformers is what makes them effective. I can tell you at once which five men in my town can be counted upon to get up a movement over night. It has taken over ten years to find them out. But was there any other means of finding them? I have a friend in Binghamton who can tell me all about the state of the reform sentiment in his town. He does not have to call a convention in order to determine whether or not Binghamton can lend aid in a state campaign against the Ramapo Water Company. He knows just which men in the town are at the present moment clear of Ramapo influence and just about how much support they can get from the general public in any fight they set up. He knows that the Ramapo Company is another name for the Political Machines, and that if he formed a political organization it would be worth the Ramapo's while to hamstring his organization by corrupting some of its weaker members.

SPOILS—THE OBJECT OF PARTIES.

Political parties measure their success by the number of offices they capture, and so we are told that reformers have no power unless they capture offices. This is like trying to measure how much good a man does by how much money he earns. It is absurd. Of course you cannot measure the influence for good done by a reform campaign, any more than you can measure the influence of six months of boarding school on your eldest boy. You can hardly ever measure the influence of any good thing. You cannot measure the good influence of St. Luke's Hospital. And no reformer ought to expect Providence to present him with a half yearly balance sheet for him to show to his friends. But there is a very consoling feature about reform work if taken up in the right spirit. It makes not much difference what you lay your hands to, or whether it would generally receive the name of politics, or charity, or education; so long as it tends to make men public spirited and tender-hearted, it is valuable. You can trace any effective charitable or educational work right home to its

political effect, or any bit of politics right home to its educational effect. That is the reason why all of us, without knowing exactly why we do so, concede the first place of honor to those workers who live among the poor. These men, within their limits, accomplish all reforms at once. The rest of us have to justify ourselves and our work by showing that in the end it operates as theirs does in making men honest, self-respecting and high-minded.

The workers among the poor show the maximum of self-sacrifice, and therefore we approve of them; they show also the maximum of what is visible in results, can see their kindergartens and their libraries, and therefore we approve of them. The political reformer sacrifices, at the best, a few hours or months of his time. He does not present a very heroic spectacle. The severest class of political reformers among us do no more than might be expected of any right-minded man in a democracy. The results which these men accomplish are a change in the political atmosphere. Such results are too indefinite to be noticed; and unless a man has had a hand in a reform movement himself, he is apt to believe that such changes for the better are phenomena of nature, and occur by themselves, without anyone's effort, and in spite of all apathy.

Hence it is that agitation for morality in politics is not a popular occupation. And yet nothing else will do the peculiar educational work which this kind of activity accomplishes. It is both a harder job and a greater service to mankind to make a banker vote against his party than to make him give $1,000 to a hospital. For not only is the vote very apt to cost him $50,000 in loss of business, but the vote causes him to think; while the gift of $1,000 allows him to dine and sleep in peace, and is apt to be a good investment at that.

The average American citizen has an idea that if only the reformers would take the proper course they could no doubt accomplish much. He will agree to anything which does not call on him for work. He is glad when you tell him that a third party is not desired, but is outraged if he hears that anything can be done except through a party. He revels in any line of reasoning, whether optimistic or pessimistic, which leaves him free of the business; and avoids any reasoning which leads up to his taking a hand in reform. When all is said on the matter, this remains the practical question in America, to get the average man to see that reform is his business.

INDEPENDENT PARTIES.

By A. S. Haight.

The average business man is so occupied with his affairs that he would believe his obligations as a citizen fully discharged when he registers prior to and votes on election day. No thought is given to the issues of the campaign, and he supports his party nominees or votes the opposition ticket without knowing anything as to the qualifications, character and ability of the candidates. Conclusion is often deferred until he stands behind the curtain in the election booth, pencil in hand, when, if honest and sincere, he realizes for the first time that he cannot vote intelligently, and usually supports his party ticket right or wrong. Asked to take part in local matters, become a member of his ward organization, register for primary purposes, he excuses himself, leaving the matter in the hands of the self-seeking or incapable, and blames everyone but himself because taxes are high and corruption everywhere.

Until such men can be made to appreciate the responsibility that rests upon them, until they are willing to do their duty as citizens, *because it is duty*, we need look for no permanent relief from existing conditions. Rings, bosses, party "organizations," schemes of all kinds will permeate all political bodies and nullify largely the efforts of any who seek to counteract evil influences.

Spasmodic efforts from time to time, by the best men of all parties, will continue to be made, but the boss will use the organization to defeat his own party whenever *his* supremacy is in danger, just as Mr. Low was defeated in 1897. The fact that the candidate is a man of unquestionable ability, spotless character, sterling integrity and lofty patriotism will avail nothing. On the contrary, these only serve to make him more objectionable to the boss, because such a man cannot be used to further his purposes.

Two such organizations, controlled by two bosses, are the two great political parties of to day in the Empire State. As if by agreement the territory or zones of influence seem to have been

apportioned by them. One confines its operations generally to the City of Greater New York, the other to the State at large. As between the two, there is no choice for an honest man. When necessary to maintain supremacy against an independent movement, the bosses will form a coalition and elect which party shall temporarily go down in defeat and be resurrected when the clamor of public opinion has subsided. Neither is actuated by motives considered honest or honorable by honorable men in the daily walks of life, and no ambitious man seeking political preferment, can come in contact with them and not be soiled by the association.

Such being the existing conditions, it is pertinent to inquire as to the origin and growth of these organizations and the possibility of relief from their depredations.

EVOLUTION OF THE BOSS.

No one will deny that their roots are planted in the formative periods of those great corporations that wanted special legislation, much of which should have been had for the asking, but more should never have been enacted. For many years their purposes were obtained by the employment of the "third house." That proved expensive, was always uncertain, often dangerous and unavoidably attended with more or less publicity. A change of method became necessary. The situation required concentration: absolute power centered in a man who could act in a dual capacity, viz.: *protect* the *corporations* and *control* the *legislature.* Once controlling the legislature, the executive could be checkmated when necessary. And so it is that we have to-day in this Empire State, centered in one man, not a member of the legislature, not the executive of the state chosen by the people by constitutional methods, but the boss and leader of "the organization," whose will is expressed by the vote of the senate and assembly and ratified by the executive whenever he chooses to exercise his power. Thus, by the process of development, we have come to a time when the Republican party in the State of New York has become a disgrace to the party in the nation and a menace to its administration of national affairs.

Carried to a logical conclusion it must end in the disruption of the government or the destruction of the party, unless checked by the people at the fountain head of the difficulty. What can

be done in New York State will be done in other states. In fact, it is being done, and everywhere there is an under-current of dissatisfaction not expressed in the public press. Men are slowly becoming conscious that their rights have been usurped by political organizations controlling parties; and the "post of honor" has become "the private station," for good men decline nominations because they will not become the instrument of the boss. Conventions no longer express the will and wishes of the people. The real executive is the boss. The nomination just now forced upon Governor Roosevelt, against his better judgment and wishes, was for purposes obvious to all. No sane man believes he would have been renominated for governor if Mr. Platt could have prevented it, or elected if nominated, but he was strong enough to render an unusual course necessary and the boss has "kicked him up hill."

A THIRD PARTY NEEDED.

I am one of those "fool reformers" who believes the remedy can only be found in and through a *third party* movement, which will be independent of and quite distinct from the issues that divide us in national politics.

Questions of municipal administration occupy the public mind to an extent heretofore unknown. These must extend and continue with the increase of population, until they embrace the administration of the state; until the people of state and city realize their interests are mutual; until questions of national policy, in time of peace, can be separated from those of state and municipality. When this is done it will not be accomplished by either of the two parties who may at the time be dominant in the state, but by and through a third party, composed of the best elements of all parties united for the purpose of destroying the common enemy, protecting the interests of the people, securing to all the enjoyment of their rights, enacting proper laws, repealing improper laws, and enforcing all.

When that time arrives the statute of limitations will not protect those caught red handed in official corruption, and commissions of inquiry composed of men, eminent in the counsels of the opposing party, will not be required or used by the executive to blind public opinion.

It is hardly possible that any permanent good can be accomplished by or through efforts confined to municipalities. They

cannot secure sufficient representation in the legislature, and so will go unrecognized by either party. Co-operation is therefore necessary, because success is impossible without it; and when the good men of all parties in city and state conclude to resume the direction of their own affairs, parties, rings and bosses will go down before them. That party organizations will combine to defeat independent movements is to be expected. That they can do so always, seems improbable. Whatever the fact, it remains true that out of such movements, always far in advance of general recognition, comes the destruction of old parties and the formation of new ones. As a Republican, I sincerely hope my party will not be destroyed in this way.

Two years ago a little coterie of personal friends and admirers, independents of all parties, nominated Colonel Roosevelt for Governor. He had just returned from the Spanish war where he was thought to have accomplished much. The people, wild with enthusiasm, seized upon him as the military hero of the hour. No sooner had the independents nominated him, than the boss perceived he was a candidate the organization could not defeat. He must be endorsed or he must be nominated. To endorse would ruin the organization. To nominate would possibly destroy, and in any event checkmate, the independents. To obtain nomination by the organization, Colonel Roosevelt must throw the independents overboard. That seems to have been the condition insisted upon and accepted. At any rate that is what was done, and doubtless on the general principle that "at times a man must cut loose from his associates and stand alone for a great cause." No one doubted his integrity of purpose or that he was resolved to be a "practical reformer," but many now believe him one of those "simple and sincere men who have a twist in their mental make-up."

If anyone believes that by the course persued he did more than delay the triumph of a third-party movement, let him watch subsequent events. The boss, unable to control him altogether be it said to Governor Roosevelt's honor, and yet afraid to re-nominate him for personal reasons, has been instrumental in removing him from the field of state politics. As a candidate for vice-president, he must and will be supported by Republicans and independents alike, and "with a disinterested purpose to serve the public" will continue to "strive steadily for reform." His efforts

will be greatly appreciated by those sincere and honest friends who first put him in nomination and doubtless his co-operation will speed their cause in this state. Be that as it may, the independents have but one course to persue. They must work and wait. Work, in order that the people may come to know what they are contending for. Wait, until understanding their motives and fully appreciative, in defense of their rights, they will temporarily lay aside party affiliations and join in the destruction of organizations that otherwise will destroy the state.

MUNICIPAL REFORMERS IN PARTY POLITICS.

By John W. Keller.

Politics is essentially practical. The individual or the body of individuals that enters politics with any other idea of using it to advantage will fail. Theories are all well enough in the abstract, but the theory that cannot be used practically has no place in politics. This does not necessarily mean the sacrifice of high principles or the abandonment of lofty ideas. Right must win in politics as elsewhere, and the political practice that places wrong above right must fail in the end. The individual who has no principles but looks to politics merely for personal gain becomes either a barnacle on a political party or what is known in political circles as a "striker." The "striker" may be found first with one party and then with another, but always with that party which most serves his personal advantage.

The question to be discussed is: How may a party of citizens banded together for a definite purpose attain that purpose when the banded party is not strong enough of itself to do what it wants to do.

THE TRUE INDEPENDENT.

On general principles I believe in parties. Nothing can be accomplished in politics without organization, and organization itself makes parties. There are individuals in the community who are so independent in their ideas, so dogmatic in their opinions, so isolated in their principles, that no party can be satisfactory to them because no large number of people can ever agree with them. These individuals are wont to flock alone and to chirp at political organizations great in number, as things of evil created against the public welfare. Such individuals can never accomplish anything in politics because they never acknowledge that anybody else than themselves can be right even when the vast majority of their fellow citizens are of a different opinion from themselves.

The only sensible independent in politics is the man who analyzes the platforms of opposing parties, strikes a balance between them and chooses that which he believes to be the best.

It is men of this kind that really hold the balance of power in American politics whether it be national, state or municipal. Of course, when there is some great principle at stake and no existing party will stand for that principle, men who believe in it must band themselves together and fight for it even though it be through bitter and successive defeats, for it is better to lose knowing that one is right than to win knowing that one is wrong.

THE REFORMER'S ATTITUDE TOWARDS PARTIES.

In matters of local government and of local reform, it seems to me that a body of men with a definite object in view would be justified in making an alliance with that party which could and would secure them the object sought, provided always that there was no sacrifice of principle in that alliance. The object, however, must always be for the public good and not for some individual benefit. For instance, if an assemblyman were to be elected in a close district, and the personal friends of a candidate should bargain with any party to elect that candidate on condition that his personal friends should vote with that party, there would be nothing in this condition but a mere barter of votes for office, a thing at once despicable and traitorous.

On the other hand, if some reform were necessary in a community where a pledge from a party would insure that reform, the people wedded to the reform would be justified, in my opinion, in voting for the party that would secure the reform, provided again that some greater principle were not sacrificed by such an arrangement. For instance, if there were a municipal election where some question of municipal improvement were involved, say rapid transit, and one party was pledged to rapid transit and other parties would not pledge themselves to it, I believe that an organization for the promotion of rapid transit would be justified in voting for the party pledged to rapid transit, provided there was not some greater issue at stake. Otherwise rapid transit would not be achieved, for if the dominant political parties were against it, it would be impossible to form a successful political organization involving no other principle and having no other purpose in view than the attainment of rapid transit. If, however, there should be some greater principle at stake in a campaign, something involving the morals of the community, a man would be untrue to himself to sacrifice the greater for the less.

PARTIES ESSENTIAL.

The individual alone can do nothing in politics, because he can cast but one vote. To accomplish anything, he must get other individuals to associate with him and to vote as he votes. In order to do this, he must not despise the opinions of others. Men who differ from him may be wrong, but they are in all likelihood honest in their difference, and political effect is generally the resultant of many forces. The individual who stands alone can accomplish nothing in politics, no matter how absolutely convinced he may be that he is right and the rest of the world is wrong. To attain his purpose, he must either convince enough other men that he is right to win at the polls or he must convince the leader or leaders of some organized political party that it is to the advantage of that party to make common cause with him in the attainment of his purpose. Personally, I am so much of a partisan that I would not look outside of my own party for means to attain any purpose by political means that I might have in view. But I can see no wrong in men who are not allied to parties, and there are many good men in this position, making alliances with any party for the attainment of a definite purpose, provided they do not sacrifice a greater principle in doing so. Otherwise how can they expect to get any political results? They may sit alone forever and attain nothing, if they wait for great political parties to subordinate their principles for the single issue in which the small body of individuals may be interested.

There are many people who believe firmly in tenement-house reform. They are enthusiasts on that subject. Suppose a municipal election were at hand and one of the two great parties in this city should declare for tenement-house reform and the other should declare against it. Would the tenement-house reformer be justified in voting for the party that declared for tenement-house reform although his sympathies had always been with the party that had declared againt it? I think he would be quite justified in doing so, provided there was no issue in the campaign that appeared to him to be of more importance than tenement-house reform. There is an organization in this city, the purpose of whose existence is the attainment of tenement-house reform. Would this organization be justified in making an alliance with one of the two parties in order to secure a plank in the platform of that party pledging it to tenement-house reform? I think it

would be, provided the organization considered that there was no other issue in the campaign involving a greater principle than tenement-house reform.

So with all individuals and organizations having special objects in view. If a farmer cannot harvest his own crop, he must get his neighbor to help him; but in order to get that neighbor, he must not only be willing but must promise to help the neighbor harvest the neighbor's crop. In American politics the individual benefit is always considered by the voter. If a man has large vested interests on a gold basis and believes that free silver will imperil them, he is not likely to vote for free silver, no matter what other issue may enter into a campaign. It takes a very broad and a very liberal mind to sacrifice the individual for the general good. The trust magnate will vote for the party that promises to protect trusts, and the individual striving to better his condition without any vested interests in trusts or any hope of such interests will vote with the party that promises to demolish them. The man who believes that his money interests will be conserved by protection will vote for protection, and the man who believes that his individual financial condition will be improved by free trade will vote for free trade.

The *argumentum ad hominem* has become so fixed in American politics that it is the main resort for all political parties in all campaigns to obtain votes. Men that can look beyond themselves and vote for the general good at the sacrifice of their own pockets are extremely rare in this and all other countries. And so with political parties that are organized to win. They must come before the people with a formulated set of principles to which they are pledged to adhere. In some parties the platform lasts only till election, but the experiment of fooling the people is a dangerous one. To repeat it often is political suicide. The party is always looking forward to victory. It is always doing everything in its power to win. Therefore, it is open to propositions from independent organizations having special objects in view. I can see no reason why such an independent organization should not take advantage of political conditions that lead to an alliance with powerful parties, provided no principle is sacrificed in such a course, and I can see no other way for an independent organization to attain its purpose of municipal reform, unless the independent organization itself should grow into a dominant political party.

COUNCIL REFORM IN CHICAGO:

WORK OF THE MUNICIPAL VOTERS' LEAGUE.

By Edwin Burritt Smith.

We have too long sought relief from municipal misrule by way of increased reliance on executive authority. There has been a tendency to rely less on the council, seek a temporary refuge in the executive and make the final stand in the courts. Thus, as our aldermen have become less representative of public and more of private interests, we have sought relief in an increase of affirmative executive power and a larger use of the negative authority of the courts. The retreat has been marked by various efforts to cripple the legislative authority before leaving it to the control of special interests. The authority taken from the council has been given to the executive. The powers of the mayor have been increased and new executive commissions and boards created.

This policy has but whetted the insatiable appetite of the forces to which the council has been abandoned. In the pursuit thus invited, they have already acquired undue influence in executive chambers; and signs are not wanting of their purpose to add the courts to their possessions.

ORIGIN OF THE MUNICIPAL VOTERS' LEAGUE.

The alarm, due to a growing public perception of these tendencies, led early in 1896 to the organization of the Municipal Voters' League of Chicago. In the preceding year, the council had reached the final stage of open and shameless corruption. Some fifty-eight of its sixty-eight members were organized into a "gang" for public and corporate plunder. Within that year it granted to public service corporations and blackmailing syndicates, composed in part of its own members, six great franchises of untold value, in shameless disregard of the public protest and the mayor's veto. The city council was in open alliance with the corrupt forces that have so long made municipal misrule a reproach to the American

name. Within a few years the principal franchises of the traction companies of the city were to expire. Plans to secure renewals in utter disregard of public rights were already laid.

It was under these circumstances, and to stem this tide of public corruption, that the Municipal Voters' League came into existence. The growing interest in municipal administration had brought into being and useful service the Civic Federation a few years earlier; and the agitation led by the Civil Service Reform Association had resulted in an excellent civil service law. The demand of good citizens of all elements of a great population for council reform had now become general.

The task seemed all but impossible. The most urgent appeals a year before by the Civic Federation "to attend the primaries" had resulted only in disappointment. The city was in the grasp of corrupt politicians and public service corporations. The national political organizations had long shared the spoils of the city in co-partnership as a "happy family." The registration lists bore the names of fully three hundred and fifty thousand voters, about three-fourths of whom were of foreign birth or parentage. All these were absorbed in private pursuits. Could they be united in an effort to regain representative government? Few so believed.

It was in the face of these difficulties that, in January, 1895, some two hundred and fifty men representing various clubs and reform organizations met at the call of the Civic Federation to consider what might be done. There was a sharp discussion of a suggestion to organize a "municipal party." A committee of fifteen representative men finally reported to an adjourned meeting in favor of the formation of a "Municipal Voters' League," to be composed of one hundred representative men, with power to act to secure the election of "aggressively honest men" to the council and to sustain the civil service law. The conference was hopelessly divided on the proposal to form a "municipal party" and so organized a league, leaving it to show by its works whether it should in time become a party.

ORGANIZATION AND MEMBERSHIP.

The committee of one hundred was composed of a republican and a democrat from each of the thirty-four wards of the city, and thirty-two chosen at large without regard to residence or party.

It met but twice, once to elect a president and give him authority to appoint an executive committee, and after the first campaign to receive the report of the executive committee and authorize it to perpetuate itself.

The League, after its first campaign, assumed its present simple form of organization. The executive committee has a membership of nine. The term of service is three years. That of one-third of the members expires each year. Vacancies are filled by the unanimous vote of those holding over. In their choice, no attempt whatever is made equally to represent the political parties. There has usually been a majority of independent democrats on the committee. At present the committee is composed of eight members, there being one vacancy. Of these, five are lawyers, one is an architect, one is a business man, and one is the warden of a social settlement. Two have served since the organization of the League, and two since its first campaign. All are of the mugwump type. There has never been a division on political lines. Indeed, in the five campaigns in which the League has participated there has been but one important action taken that was not directed by the unanimous vote of the executive committee.

The executive committee selects the officers from its own number. Their duties as officers are administrative, no final action on candidates or other important matters being ever taken without the vote of the committee. The executive committee appoints finance and other special committees, often from outside its own membership. It appoints ward committees usually of from one to five members. Their duties are to advise the executive committee of local conditions; upon its direction, to start movements for the nomination of independent candidates, or to secure their retirement; and to perform such other duties as it may request. No person, committee or organization in any ward has authority to use the name of the League, or in any way to commit it for or against any candidate. This is regarded as vital to efficiency. The executive committee alone controls the use of its name. It is known by all that the League speaks only through letters and bulletins signed by its president or secretary "by order of the executive committee."

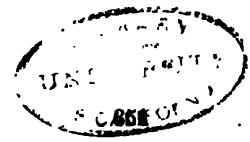
The League has a large general membership composed of voters in all parts of the city, who sign cards expressing approval of its purposes and methods. Many who do not even take the trouble

to send in their names regularly look for its recommendations and act upon them. No general meetings of the members are held. When a campaign is on, public meetings are sometimes called in the name of the League in wards in which it is making sharp contests.

ASSISTANCE GIVEN BY THE PRESS.

The League mainly relies on the mail and the press to communicate its facts and recommendations to the voters. In 1897 it mailed to every registered voter in the city a pamphlet giving a detailed history of franchise legislation for several years with the records in respect thereto of the retiring members of the council. As the work of the League has become known, it has relied more and more on the press as a means of communication with the voters. Its report on the official records of the retiring half of the council, usually published about two months before the election of new members, is looked forward to as a sort of annual judgment day and is generally regarded as the opening of the aldermanic campaign. Its final report on the qualifications of all candidates, usually published on the Friday preceding the election, places in the hands of all voters who care for it the facts from which to form their own conclusions for whom to vote.

The cordial support of the League, through five consecutive campaigns, by the local press, illustrates anew the splendid public spirit of its proprietors. Full-page advertisements, purporting to show the reasonableness of their demands, were run for days in all the great dailies by the traction companies in the fight to obtain fifty-year extensions of their franchises, to which reference is made below. Yet all the papers, except the one owned by certain traction interests, remained true to the cause of the people, actively supporting the League candidates for the council. Chicago owes much to the proprietors of her great newspapers. They have for years more and more sunk the ordinary rivalries of business and cordially united in effective support of whatever has made for civic betterment. Few know the extent or power of the influences which they have resisted to this end. The resources of the public service corporations of a great city are enormous. Like the centurion of old they say unto one, Go, and he goeth; and to another, Come, and he cometh; and to their servants, Do this, and they doeth it. In their fight for fifty-year franchises, the traction companies of Chicago commanded the support of powerful stockholders,



bondholders, brokers and bankers—all whose interest it is to have floods of local investment securities of the highest possible value. All these, backed by the other public service corporations, exerted every possible influence upon the public press in behalf of special privilege. To the honor of the Chicago press, they secured but a single newspaper and that by direct purchase.

CAMPAIGN METHODS.

There is no attempt by the League to keep up the usual pretense of direct representation of its constituency. It assumes that character and capacity are the fundamental qualifications for useful public service; that men having these qualities will faithfully represent the people, treat justly all private interests and dispose of every public question on its merits. It claims to represent only those who approve its purpose. It appeals for their support in every case only on the basis of the facts given to sustain its conclusion and recommendation. The appeal is always to the individual voter through bulletins such as the following:

Twenty-First Ward.

————. —Lawyer, 603 Kedzie Building, resides 83 North Grove place. Elected to council in 1898, with indorsement of League; since assuming office has made constant study of street railway situation; instrumental in drafting new rules for council, including plan for standing committee on compensation, which rules failed of adoption; fought street railways' attempt to secure fifty-year franchises; opposed Powers' organization of council and voted for resolution establishing special committee on street railway legislation. He is an exceptionally strong and able man in the council and diligent in behalf of the public welfare. ALL GOOD CITIZENS SHOULD URGE HIM TO BE A CANDIDATE AND REGARDLESS OF PARTY SHOULD INSURE HIS RE-ELECTION.

———— *Ward.*

——— .—Republican; insurance business, ——— street; residence, ——— street. Born in State of New York; moved to Michigan and enlisted at breaking out of the war; has been in insurance business in Chicago for many years; an old resident of the ward; he declines to say whether he will or will not vote for or against fifty-year franchises and extensions; bears a good business reputation.

The first of the above recommendations, backed by an active campaign in the ward conducted by the League, resulted in the relection of the candidate as an independent. In the other case the candidate was defeated in an overwhelming republican ward, although the League was obliged to say of his opponent that his business record was not good but that he had "signed League platform."

It is of course not to be supposed that such treatment of candidates goes without question from those condemned. In every

campaign some bold but unwary members of "the gang" turn upon the League. How these opportunities are improved may be illustrated by an open letter by the president of the League given out a few days after the publication of its preliminary report on the retiring aldermen, as follows:

MR. ———, ALDERMAN FROM THE —— WARD.

Dear Sir—Permit me to acknowledge receipt on this date of the open letter of the 14th inst. with which you have honored me. You express surprise that your official record does not inspire the Municipal Voters' League with confidence in your zeal in the defense of the city from fifty-year extensions of existing street railway franchises. This merely suggests that you may have underestimated the capacity of "theoretical reformers" to draw conclusions from official records. We have simply said of you this:

"———: keeps restaurant at ——— street; lives ——— street; elected to council in 1897; his record indicates weakness of character; is recorded as not voting on Commonwealth Electric, though against it after veto; opposed General Electric ordinance and gang organization of council committees; voted to proceed with seventeenth ward contest, for prohibiting action on franchise ordinances for thirty days after introduction and for appointment of special compensation committees; having made this good record he spoiled it by continuous support of the street railways in their fight for fifty-year extensions; he cannot be depended on and should be retired."

You will note that this is a simple recital of facts, with the conclusion that we have ventured to base upon it. You do not question these facts, but raise immaterial issues whether you have violated your pledge of two years ago to the League or failed to sustain the mayor "on all ordinances that have come up for consideration in the council." If you will now quietly read our recital you will note that we express no opinion on these points.

Our real offense, which you exaggerate into "license to traffic in the personal honor of mankind," is merely our conclusion that you "cannot be depended on and should be retired." We concede that it would be quite improper for us to pronounce judgment upon your fitness for re-election without stating with accuracy and plainness the facts upon which it rests. It may even yet occur to you that if our conclusion is unsupported by the facts stated, it must fall to the ground. Indeed, if the above recital of your votes on matters of vital public concern is a record of which you are proud and which entitles you to re-election as a champion of public as against corporate interests, we are entitled to your thanks for the wide publication which we have given and shall yet give it. It is well that the city should know the deeds of its heroes in the council arena. It is our humble function to help it to know them.

You must pardon us if we cannot agree with you as to the reward to which your service in the council entitles you. This is the sole issue. It is quite immaterial whether I am a "theoretical" or a "practical" reformer. The question is upon the record which you have made. The voters of your ward care nothing for our differences of opinion respecting it, but I can assure you that the record itself is of exceeding interest to many of them at this juncture. However we differ in regard to "practical reformers" and as to the inferences to be drawn from your somewhat wobbly official record, we may at least co-operate to give that record the widest possible publication.

Yours very truly,

President Municipal Voters' League.

The publication by the newspapers, with editorial comments, of this retort finished the work of making a candidate for re-election unavailable. He was not afterwards heard from and failed of renomination. His successor was elected with the indorsement of the League.

One of the first acts of the League upon its organization in 1896 was to oppose the renomination by a good constituency of a man of social and business standing whose record was good except as to a few votes for notorious measures. The intention was by this act to set a high standard and test public sentiment. A significant correspondence followed:

CHICAGO, March 4, 1896.

————,

PRES. MUNICIPAL VOTERS' LEAGUE,

Dear Sir—I notice in the Sunday papers that your organization says that it cannot indorse Alderman ———— of the ———— Ward for re-election. You will, I trust, pardon me when I say that in this you may have made a mistake, as I judge that you came to this conclusion from what has been said to you by the parties indorsing Mr. ————. I have known Alderman ———— for some time, and I have no hesitency in saying that he is one of the best aldermen in the city council; and should you take the trouble to see him and talk with him, you will find that in every instance where he is charged with having voted for a so-called "boodle" ordinance it was not done corruptly, but that he might secure votes for some meritorious measure that would benefit the whole people.

I do not live in his ward and have no other interest in this matter than to see that active, earnest and honest capable aldermen are elected to the council; and I urge upon your committee that they re-consider their action and use their best efforts to re-elect Alderman ————, not in the interest of party politics, but for the best interests of this great city of which we are all justly proud; and in conclusion I desire to say that I owe much to his assistance for the passing of the Jackson Blvd. ordinance.

Respectfully yours,

[Signed by a high public official.]

Indorsed—I have known Alderman ———— for more than twenty years last past, and believe that the best interests of the city will be conserved by his re-election.

[Signed by three republican judges on the bench and several citizens of high standing, all being of the party to which the candidate belonged.]

The following reply was promptly made by the executive committee of the League:

CHICAGO, March 6, 1896.

HON. ———— AND OTHERS.

Gentlemen—Your communication of the 4th instant in respect to the candidacy of Mr. ———— for re-election as alderman from the —— Ward has received that careful consideration by the executive committee of the League to which its subject matter and your positions and standing entitle it. I have also had a personal interview with Mr. ————. This re-examination of the question presented has confirmed the committee in their conclusion that the League cannot indorse Mr. ————'s candidacy for re-election. This conclusion is not due to the influence of Mr. ————'s friends as you suppose. It

rests solely on the public record of Mr. ———. As alderman, he voted for the Universal Gas, Calumet and Blue Island, General Electric, and other questionable ordinances.

You say: "You will find in every instance where he is charged with having voted for a so-called 'boodle' ordinance it was not done corruptly, but that he might secure votes for some meritorious measure which would benefit the whole people." We regard this defense of Mr. ———, which is put forward with confidence by men of your standing, as painful evidence of the low standard by which the public conduct of city officials has come to be measured even by good citizens. Gentlemen, has it not occurred to you that the defense which you suggest for Mr. ———, that he gave his vote for corrupt measures in exchange for votes for meritorious ones, is a defense which is equally available to the most notorious boodler in the council? Do you not know that this is one of the most insidious and common forms of legislative corruption? Would you have a reform movement indorse the support of corrupt ordinances in exchange for the votes of their promoters for meritorious measures? We cannot believe that this is what the public expects of the Municipal Voters' League. It is the unanimous opinion of the executive committee, reached after careful and unprejudiced examination, that Mr. ———'s official record does not justify the renewal of his commission to exercise a great public trust.

Our standard, only aggressively honest and capable men for city officials, may now by comparison seem high, but we believe it to be the only true one. We may not at once secure such candidates in all cases, but we can at least make public the records of all candidates. We intend that no man having the public record of Mr. ——— shall return to the council as the representative of reform.

By order of the Executive Committee,

———,
President.

The publication of these letters made a sensation. The supposed writer of the first, on whose official letter head it appeared, announced that it was written by the alderman himself, and that he signed it without reading it. The others also informed an interested public that they indorsed the letter without reading it, supposing it to be "all right." The correspondence was mailed to the registered voters of the ward. The press published and fully discussed it editorially. The candidate, who had been re-nominated in the meantime, failed of re-election by some eight hundred votes, although his party carried the ward for town officers at the same election by a majority of about twelve hundred.

The open headquarters which the League maintains for about two months prior to each aldermanic election, is the clearing house of the aldermanic campaign. It is thronged with party representatives, candidates and citizens. These come seeking to influence the executive committee for or against particular candidates, both before and after the nominations are made. Suggestions, remonstrances and eulogies pour in from all quarters. Blank inquiries are mailed to all candidates as soon as announced or nominated.

Letters of inquiry to references follow. Trained emyloyes of the committee scour the city for information; often different ones working separately are detailed on the same case. All who come are patiently heard, and the facts are carefully ascertained. It is remarkable how quickly the machinery employed usually brings to the committee sufficient facts upon which to base a safe conclusion. As the campaign progresses, candidates often bring false charges, made by or on behalf of opponents, to the attention of the committee. A careful inquiry, sometimes a "confrontation" in the presence of the committee, follows. A simple bulletin from the League, to the effect that it has been investigated and found to be without foundation, published in the newspapers lays a charge. Thus, incidentally the League is able promptly to suppress false charges and keep the contest on the facts and the real issue.

The president and secretary, at great personal sacrifice, give practically their whole time to the work during the active campaign. They are assisted by the best obtainable employes. The executive committee meets for an hour or more late in the afternoon of almost every day. No final action on candidates is ever taken without its consideration and vote.

EFFECT ON NOMINATIONS.

The officers of the League are coming more and more to be consulted in advance concerning proposed nominations. Party managers in many wards, where its support has become vital to success, submit names of proposed candidates. Several are often suggested and rejected before one, after careful inquiry, is approved. Then, too, a proposed candidate, who is regarded objectionable, and his supporters are frequently called in and advised that the League will oppose his nomination and election unless it can be satisfied of his fitness. The confidences of these conferences are faithfully kept. Party managers are given full credit for fit nominations however much they may have been influenced by the committee. No announcement is ever made that a particular party nomination has been thus forced by the League. It, however, often participates in support of the better candidate at contested primaries. It is its policy not to suggest candidates in the first instance but rather to pass on those named by others. When necessary in a given ward, in order to force a good nomina-

tion or to have at least one fit candidate, it promotes the nomination of an independent by petition. When the candidates are in nomination it takes an active part in the wards where there is danger of the election of unfit men.

INFLUENCE ON ELECTIONS.

Such, in substance, are the methods of the Municipal Voters' League. What are the results? It has now participated in five successive aldermanic campaigns, each involving the election of thirty-four aldermen, being one-half of the city council. In its first campaign, that of 1896, twenty candidates having its indorsement, two of them independents, were elected. Five others were given a preference over their opponents. Of the first class, fifteen throughout their term of two years resisted all adverse influences and stood faithfully for public interests. All the others sooner or later joined "the gang." The League in 1898, in its preliminary report on the retiring members of the council elected in 1896, recommended the faithful fifteen for re-election and nineteen for defeat. Of the first group three declined renominations; the others were renominated and eleven of them re-elected. Of the nineteen condemned by the League ten failed of renomination and all but three of re-election. The street railway fight being on, an unusually large number of ex-members of bad record sought in this campaign to return to the council. Of twenty-five of these but six were nominated and three elected.

The results of the League's work in ridding the city of the notorious council of 1895 are in some measure indicated by the following tables:

FIRST YEAR, 1896.[1]

Outgoing aldermen with bad records	26
Failed to secure renominations	16
Renominated and re elected	6
Renominated and defeated	4

The League's recommendations were followed in twenty-five wards. In five it was unsuccessful. In four it made no recommendations.

SECOND YEAR, 1897.

Outgoing aldermen with bad records	27
Failed to secure renominations	15
Renominated and re-elected	3
Renominated and defeated	9

[1] The League recommended but two for re-election.

The League's recommendations were followed in seventeen wards. In thirteen it was unsuccessful. In four it made no recommendations.

THIRD YEAR, 1898.

Outgoing aldermen with bad records	19
Failed to secure renominations	10
Renominated and re-elected	3
Renominated and defeated	6

The League's recommendations were followed in twenty-three wards. In eight it was unsuccessful. In three it made no recommendations.

FOURTH YEAR, 1899.

Outgoing aldermen with bad records	23
Failed to secure renominations	18
Renominated and re elected	2
Renominated and defeated	3

The League's recommendations were followed in twenty-five wards. In each of two wards, where vacancies were to be filled, the candidate of each party commended by the League succeeded. The democratic candidate for mayor carried nearly all the wards. In seventeen, wherein he had majorities, republican candidates for the council having the indorsement of the League succeeded.

FIFTH YEAR, 1900.

Outgoing aldermen with bad records	16
Failed to secure renominations	5
Renominated and re-elected	9
Renominated and defeated	1
Renominated by petition and defeated	1

The League's recommendations were followed in seventeen wards. In seven others, it commended all the candidates as qualified. Twenty-five of the thirty-seven, successful candidates had its indorsement over all opponents or its commendation with others. Three of these ran as independents. In this campaign the party organizations in several of the worst wards openly joined forces to return members condemned by the League. To this brazen performance is due the re-election of so many condemned members this year. The "gang" of 1895 is no more. Four only of its members, now in a hopeless minority, linger on the scene of their former exploits to mourn the good old days when "aldermanic business" was good. The feeble band of faithful members of five years ago became a minority of one third,

enough to sustain the veto of the mayor, after the first campaign of the League; two years later it became a majority; one year ago it rose to two-thirds of the council and organized its committees on a non-partisan basis.

These results are due to a growing disregard by the voters of party names and entire confidence in the singleness of purpose and freedom from partisan bias of the League. There has been no waiting for ideal conditions as a basis for reform. The League has seized and used the means at hand. Party organizations, fattened on the spoils of a great city, by force of an aroused public opinion have become for the moment, if somewhat halting, at least fairly efficient instruments of reform. This further appears from the note below, which has been prepared from the records by Mr. Allen B. Pond, the present secretary of the League.[1]

The gain cannot be shown by mere statistics. The attempt to secure the election of men who are both honest and capable has in large measure succeeded. Each year it has been found easier to secure qualified candidates. An increase in salary from $3 per week to $1,500 per year has contributed to this end. The council now contains many men of character and force, some of them being citizens of prominence and large personal interests. While some untried men commended by the League fall by the way, about three-fourths of them remain true. No general "boodle ordinance" has been passed over the mayor's veto since the first election in which the League participated. Public despair has given place to a growing belief that the city government may be redeemed and made representative of public interests. It is no longer a good investment for public service corporations to advance large sums for the "campaign expenses" of notorious boodlers. It has again become an honor to be a member of the Chicago council. A single term of service brings a capable man an honorable city reputation.

THE STREET RAILWAY PROBLEM.

These changes have been forced against the most powerful opposing forces. The main franchises of the great street railway

[1] In the following table of sixteen wards, the name of the party whose candidate was successful is given first in each year for four years. "Dem." stands for Democrat; "Rep." for Republican; "Ind." for Independent by petition; "Pref." for preferred by League over all other candidates in ward; "Com." for recommended by League as qualified for the office; "N-Comm." for not recommended, but also not condemned; "Cond." for condemned by League; "1897—Dem. Cond., Rep. Pref." means "aldermanic election in 2d ward in 1897. Democratic candidate condemned by League and elected; Republican candidate recommended by League and defeated."

corporations of Chicago are soon to expire. From 1896 they actively sought renewals on their own terms. By grossly improper

Ward	1897	1898	1899	1900
2d	Dem. Cond. Rep. Pref.	Dem. Pref. Rep. Cond.	Rep. Pref. Dem. Cond.	Rep. Comm. Dem. Comm.
10th	Dem. Cond. Rep. Pref.	Rep. Pref. Dem. Cond.	Rep. Pref. Dem. Comm. (short term) Dem. N. Cond. Rep. Pref.	Dem. Pref. Rep. Comm.
11th	Dem. Comm. Rep. Comm.	Rep. Pref. Dem. Cond.	Dem. Pref. Rep. Cond.	Dem. Comm. Rep. Comm.
12th	Dem. N. Cond. Rep. Cond.	Dem. N. Comm. Rep. N. Comm.	Rep. Comm. Dem. Comm.	Rep. Pref. Dem. Cond.
13th	Dem. N. Comm. Rep. Pref.	Dem. Pref. Rep. Comm.	Rep. Pref. Dem. Cond.	Dem. Pref. Rep. Comm.
14th	Dem. Pref. Rep. Cond.	Rep. Pref. Dem. Cond.	Rep. Pref. Dem. Cond.	Rep. Pref. Dem. Comm.
15th	Dem. Pref. Rep. Cond.	Rep. Pref. Dem. Cond.	Rep. N. Comm. Dem. Cond.	Rep. Pref. Dem. Comm.
21st	Dem. Pref. Rep. N. Cond.	Ind. Pref. Rep. Cond. Dem. Cond.	Dem. Comm. Rep. Comm.	Ind. Pref. Rep. Comm. Dem. N. Comm.
22d	Ind. Pref. Rep. Cond. Dem. Cond.	Rep. Pref. Dem. Cond.	Rep. Pref. Dem. Comm. (short term) Dem. Pref. Rep. Cond.	Dem. Pref. Rep. Cond.
24th	Dem. Cond. Rep. Pref. Ind. Comm.	Dem. Pref. Rep. Comm.	Rep. Pref. Dem. Cond.	Dem. Comm. Rep. " Ind. "
25th	Ind. Pref. Rep. Cond. Dem. Comm.	Rep. Comm. Ind. Pref. Dem. Cond.	Rep. Pref. Dem. Cond. Ind. Comm.	Rep. Comm. Dem. " Ind. "
26th	Rep. Pref. Dem. N. Comm.	Dem. Pref. Rep. Cond.	Rep. Pref. Dem. Cond.	Rep. Pref. Dem. N. Cond.
28th	Dem. Cond. Rep. Pref. Ind. Cond.	Rep. Cond. Dem. Cond. Ind. Pref.	Rep. Pref. Dem. Cond. Ind. Cond.	Rep. Pref. Dem. Cond.
30th	Dem. Cond. Rep. Pref. Ind. Comm. Ind. N. Comm.	Dem. Comm. Rep. Comm. Ind. Comm.	Rep. Pref. Dem. Cond. Ind. N. Comm.	Dem. Pref. Rep. Comm.
32d	Ind. Pref. Dem. N. Comm. Rep. Cond.	Rep. Pref. Dem. Comm.	Rep. Pref. Dem. Cond.	Rep. Pref. Dem. Comm.
33d	Dem. N. Comm. Ind. Pref. Rep. Cond.	Dem. Pref. Rep. Cond.	Dem. Pref. Rep. Comm.	Rep. Pref. Dem. Cond.

From this table the following facts appear: (1) In seven of the above wards, where

means, they secured in 1897 the passage in the legislature of the so-called "Allen Bill," permitting extensions of street railway franchises for fifty instead of twenty years as before. After the enactment of this law certain of the companies again and again brought every possible influence to bear on the members of the Chicago council to secure fifty-year extensions in utter disregard of public rights. It is believed that as much as $50,000 each was finally offered for votes. The council stood firm. A clear majority spurned all improper advances. The attempt ended in complete failure. Late in 1898 it was abandoned.

The enactment of the "Allen Bill" led to a remarkable demonstration of the irresistible power of an aroused and persistent public opinion. Within two years the ensuing legislature, with but one dissenting voice, repealed the act and restored the law which it had supplanted. The Municipal Voters' League, on the eve of the legislative campaign of 1898, caused the publication throughout the state of the detailed records of all the retiring members of the legislature on the passage of the obnoxious measure. A mere reminder to the voters was enough. The disgrace to the state of purchased legislation had caused deep and general indignation. The publication of the plain facts at the right moment rendered unavailable for renomination most of those who had brought disgrace upon the state. Of sixteen retiring members of the Senate who voted for the "Allen Bill," fourteen failed of re-election. Of eighty-four members of the House who supported it, sixty-eight were not returned. The vicious minority scheme of representation in the House alone saved others at the polls. Such a slaughter of legislators had never been seen in Illinois. It will not soon again be necessary.

The defeat of the fifty-year extension franchises by the Chicago

candidates of one party were chosen in 1899. Independents or nominees of the opposing party were chosen in 1900, the victory going in six instances to the candidates preferred by the League and in the seventh to a candidate commended by the League with no preference given over his competitors. (2) If the comparison is extended back to include 1898, reversals of party successes were sustained in eleven of these wards in three years, the victory uniformly falling to the League's "preferred" candidates. (3) During the four years each of these wards reversed the party decision once or more and commonly in line with the League recommendations. (4) Two of these wards, the 10th and 22d, distinguished themselves in 1899 by each electing two aldermen of different parties, sustaining the League verdict with one exception and then in favor of a nominee not condemned by the League. (5) A glance at the table as a whole discloses that from year to year their is a steady increasing assurance of success to the candidate preferred by the League and of defeat to the candidate whose official record has condemned him, and this without regard to the national party affiliations of the candidates.

council, and the restoration by practically unanimous vote of the legislature of the former statute, constitute a notable triumph of public opinion. The end is not yet, it is idle to prophesy; but not soon again will public service corporations openly purchase legislation in Illinois.

WHAT IS THE NEXT STEP?

Those whose fortune it has been to direct the hand to hand work of the Municipal Voters' League of Chicago, know full well that but a beginning has been made, that only the edge of a great problem has been touched. A powerful and resourceful enemy is still at bay, ready to take instant advantage of any failure of public leadership. The question is how to make what has been gained the basis for the recovery of representative government. It is clear that disinterested and intelligent leadership is alone wanting. It is also apparent that the methods thus far employed by the League cannot be relied upon to work a permanent cure of the disease. This is private greed. It appears in the form of a co-partnership of the bosses, masquerading in the names of the national political parties, and the public service corporation. These monsters, clasped in a close embrace, wallow together in municipal spoils. One, perhaps both, must be destroyed. They are the source of municipal misrule.

Recent events in Chicago give point to these observations. The influence of the League was never more potent than in the late municipal campaign. Fifty-five of the eighty candidates voted for at the polls voluntarily came in, signed the League platform,[3] and on it appealed for public support. Twenty-five of

[3] THE LEAGUE PLATFORM.

It is my belief that the office of alderman is one involving service to the whole public and non-political in its nature. I, therefore, believe in organizing the council committees on a non-partisan basis of integrity and fitness; and I further believe that in redistricting this city the question should be decided upon the basis of equality of population, facilities for voting, and due regard to natural boundaries; and that the city should not be gerrymandered in the interest of any political party.

I believe that the finances of the city should be so regulated that the appropriations cover the actual necessities and the expenditures be kept within the revenues. The city should have a system of auditing and accounting as strict and clear as that of any well-regulated business corporation.

I believe that the city should receive adequate compensation for all grants to private persons or corporations of special privileges in, over, under, or across the public highways, or for the use of public property.

I believe that ordinances conferring franchises for street railways, telephones, and similar public utilities should be limited to a period not exceeding twenty years.

these were elected. The pledge to organize the council committees on a non-partisan basis of integrity and fitness was so definite that it was expected it would be faithfully kept. But the city is this year to be re-districted. The Democrats having for the past two years made an inexcusable number of bad nominations, the Republicans after the election found themselves in a large majority. Party pressure proved too strong to resist. All but one of the Republicans entered a party caucus and there named the committees of the council for this year. While care was taken to constitute the committees about as last year, their published defense of this action is not well received. The League promptly denounced the party caucus as an open betrayal of a solemn pledge. It is generally so regarded.

Thus the step toward non-partisanship taken last year has been retraced. Men elected to act for the people have betrayed their pledges in order to represent in the council the local bosses of a national political party. This unlooked-for reverse has forced the executive committee of the League to consider whether the time is not ripe for the next great step in municipal reform. They have been driven to the conclusion that the law should be so amended as to prohibit the appearance on the official ballot of candidates for municipal office under party names, or their nomination except by petition. Quite likely such an amendment will be urged in the next legislature. Until this reform shall be secured by law, the League is likely more and more to promote independent candidacies. It views with increasing distrust the presence in municipal politics of a power that can compel men of standing openly to betray their most solemn promises to the people. Whatever the discouragement of the moment, there is no disposition to falter. The League will go forward. The movement for which it stands must be persistent.

I believe that all such ordinances to a given company should expire at the same time.

I believe that all such ordinances should provide the opportunity for public ownership on fair and reasonable terms.

I believe in the merit system of civil service and in the strict enforcement of the present civil service law.

If elected I will spend requisite time in looking after the physical and sanitary needs of my ward.

I place this platform before my constituents and the people of Chicago and pledge myself to work and to vote in committees and on the floor of the council to carry out its principles.

NON-PARTISAN MUNICIPAL ELECTIONS.

LIBRARY HALL ASSOCIATION OF CAMBRIDGE, MASS.

By George G. Wright.

Upon one point there seems to be a general agreement among those who are striving to improve our municipal government, viz., that the influence of national politics should be entirely eliminated from the consideration of local affairs. While I fully agree with this conclusion, I do not assent to the assertion that this influence of necessity results in inefficient or dishonest government. On the contrary I believe that a local government elected upon national party lines is no more likely to be corrupt than one elected upon a non-partisan basis. A local government in the long run is very certain to become what the sentiment of the locality demands. If a portion of the community neglects to use its proper influence, either by refusing to accept public office or by not exerting itself in behalf of the election of proper candidates, the character and ability of its government will likely be lowered, and this has happened in Cambridge several times. The true ground for the non-partisan basis in local affairs is that the choice of the people is less restricted and the services of men of value in local affairs, who may happen to be of the minority party, are thus secured.

This was the ground upon which the citizens of Cambridge decided the question many years ago. So far as I can learn, strict national-party nominations have never been made in Cambridge, that is, nominations by two of the national parties and confined to the membership of each. Usually, the majority party has nominated candidates, some of whom in many cases were not members of that party, and the voters who were opposed to those nominations presented others under the head of "citizens' nomination" or some similar name. This is the custom at the present time in most of those cities of Massachusetts where all nominations are not non-

partisan, but upon election day party labels are pretty generally ignored by the voters.

It was felt, however, that even this nominal use of the party was not for the best interests of the city. In 1866 at the state election in November, the Republican candidate for governor received in Cambridge 2,038 votes against 550 for the Democratic candidate. At the municipal election which followed in December, the Republican candidate for mayor received only 1,269 votes against 1,663 cast for his opponent; the "citizens'" candidate, who, although a Democrat, received the hearty support of many active Republicans in spite of the most intense partisan and sectarian appeals. The population at that time was 29,112 according to the census of 1865, the number of assessed polls 7,253.

This marks the beginning of the present practice of non-partisan municipal elections in Cambridge, although it took a few years to work out a plan of nomination without the use of the national party machinery. The result has been that since 1872 with only two exceptions nominations have not been even nominally partisan. In these two cases the candidate who was first nominated by a non-partisan body and subsequently indorsed by a party convention was elected, while the candidate who reversed this order of procedure was defeated.

Thus national partisan politics lost their power as a controlling influence in our city affairs in 1866 and have never regained it. Some assert that although nominally national-party influences do not control our city elections, yet in reality the division is upon party grounds. This superficial view is based upon the statement that a majority of the Republicans support the Temple Hall nominees, while the bulk of the Democrats support the Citizens' nominations (Temple Hall and Citizens' being two municipal parties). It would certainly be as accurate to say that our elections are controlled by sectarian influences because a large part of our Catholic fellow citizens support a different ticket to that supported by a majority of their Protestant friends and neighbors; yet no one asserts this to be true. The fact is that those citizens who hold the same general ideas as to the management of our city affairs act together without regard to their disagreement upon national or religious questions.

While good men are to be found upon both sides, and bad men as well, the grounds for division as a rule are only thos

which exist from a different view of the object and purpose of a city government. On the one hand we find those who look upon the city government as a body created solely to do those things for every citizen which the individual citizen cannot do so well for himself and who consequently desire its business managed in as nearly a strictly business way as such affairs can be. On the other hand we find those who look for personal return or advantage to themselves and to their friends from any influence they may acquire in city affairs. It is well to note here that while city affairs ought to be managed in a strictly business way, they probably never will be until human nature changes very considerably. Many things have to be considered, even by an honest official, which would not present themselves to an ordinary business man, and for this reason city business will never be as efficiently and economically carried on as a private business.

Although almost all of the nominees of a convention frequently belong to the same national party, and this is true of both sides, it does not necessarily imply that they have been selected upon partisan grounds. It has been suggested that a certain percentage of the candidates should be given to each national party, which would be worse than partisanship pure and simple. Whatever some few individuals may have done, the record shows that for thirty years the citizens of Cambridge, as a whole, have been absolutely non-partisan and non sectarian in their city elections.

NOMINATION OF CANDIDATES.

The abandonment of the party machinery was followed in 1867 by a call signed by thirty citizens (members of different national parties) requesting the voters to meet and nominate candidates for the various municipal offices. The Republican city committee also called a caucus, but each meeting nominated the same candidate for mayor. In 1869 "the citizens of Cambridge irrespective of party" were requested by a notice bearing no signature to assemble to nominate candidates for city officers. So far had the feeling against partisan nominations advanced that even a local paper, which in 1866 had been intensely partisan, used the following language:

We would urge all the citizens of Cambridge to attend this caucus, for it really almost amounts to an election, as the decision of a citizens' caucus cannot easily be set aside at the polls, nor is it hardly ever desirable that it should be. * * * * The question

of whether he voted the Regular, the Liberal, or the Democratic ticket at the last election should not of itself qualify or disqualify any man for our votes.

A second unsigned request to "the citizens of Cambridge irrespective of party who are opposed to the election of" the candidate nominated for mayor by the first meeting was published later, which resulted in the nomination of a different candidate who was elected.

Until 1871 all nominations had been made by *one* caucus covering the entire city, but in that year the officers of the Republican and Democratic city committees joined in calling caucuses in the several wards to choose twenty delegates from each ward to meet in convention to nominate the officers elected by the voters of the entire city. This became the regular method three years later, and all nominations are now made by a convention of ten delegates from each ward for the officers elected by general vote and by ward cacuses for those elected by wards.

The usual custom has been for a number of citizens of some prominence to publish an invitation to their fellow citizens "who are in favor of an honest and economical administration of city affairs" or some similar broadly-worded description, to meet and nominate candidates. At the convention which follows, some committee is authorized to call a convention the following year. In time this resulted in the formation of two parties, although sometimes even four sets of nominations have been made by four different sets of conventions and caucuses.

PARTY MEMBERSHIP.

The difficulty of fixing the membership of these parties so as to exclude those who do not belong is due to the fact that while one of the parties will declare in favor of a certain principle concerning the government of the city, the other party does not declare against that principle. Neither party adopts any resolutions, its purposes being declared by its nominees upon the platform. It has often happened also that after election the nominees did not live up to their professions, offering some plausible explanation of the inconsistency. One mayor, elected upon a "Pay as you go" platform, "No debt for current expenses," to which he had orally pledged himself during the campaign, advocated and allowed the creation of a city debt of $6,500 for the cost of a new school house (which had at that time become an annual expense) when the

balance in the city treasury at the end of the year was over $148,000.

It will be seen from this that the distinction between the several municipal parties is largely a personal one, so intangible in form that it cannot be embodied in words. This makes it difficult and in fact impossible to prevent unscrupulous men from voting in both caucuses, which I have seen done on many occasions. I have even heard the same man vouched for as a supporter of each party in two opposing caucuses held in the same room less than a week apart. As the grounds of division are so nearly personal and as the unexpected result of one caucus may qualify a voter to attend the opposition caucus, it has been impossible to always preserve the integrity of the caucus. Previous to the adoption of the Australian ballot law the usual proceeding when the wrong party got control of the caucus was for a number of the leaders to call another caucus and begin anew. As nominations can now be made by nomination paper as well, this is not necessary at the present time.

INFLUENCE OF RECENT LEGISLATION.

As there were no laws regulating municipal caucuses and conventions until within a very few years, it was the power of any citizen or body of citizens to call a caucus or convention at any time before the election. However much such laws may be needed elsewhere, I have no hesitation in saying that the caucus law has been one of the worst blows to the cause of good government in Cambridge that I have known during more than thirty years of active participation in our local elections. An editorial in one of the Boston newspapers well expresses the result of this attempt to regulate the caucuses by law.

The entire business of getting a candidate nominated and bringing him before the people has become an intricate piece of work. It has to be done at such times and under such circumstances and in accordance with forms which not one citizen in a hundred understands. This preliminary work is surrounded by so many pitfalls and barriers that the ordinary citizen gives up in despair all hope of doing anything more than voting the ticket which some one else has prepared for him.

LIBRARY HALL ASSOCIATION FORMED.

With the adoption of the Australian ballot in our elections, allowing nomination by nomination paper as well as otherwise, many of us thought that a great deal of the labor devoted to protecting the control of the caucus might be saved by an organiza-

tion which should consider all the candidates before the people, however nominated, endorsing those best fitted and adding new names if there were not enough suitable candidates. This led to the formation of the Library Hall Association. The purposes of the Association, as stated in the by-laws, are

to secure the nomination and election of proper candidates for municipal offices; to procure the punishment of all persons who may be guilty of election frauds, maladministration of office, or misappropriation of public funds; to advocate and promote a public service based upon character and capability only; and to promote intelligent discussion of municipal affairs by the publication and distribution of reliable information in relation thereto.

Above and beyond all questions of policy or of candidates, the Association stands for and supports the principle of non partisanship in municipal affairs, asserting that in the choice of a city government national issues have no place whatever.

The membership of the Association is confined so far as possible to those who are known to support the principle that the government of a city is a simple matter of business, and that the city is only an organization to do for the whole people those things which cannot be so well done by each individual for himself. The Association includes men of all parties, sects and races, of various occupations with widely divergent views upon many other questions but agreeing upon the principle for which it stands. There is no limit to the number of members, and candidates for membership may be proposed at any time. If approved by three-fourths of the executive committee, they may become members upon signing the by-laws and paying an admission fee of one dollar. The number of members upon November 13, 1899 was 450. Up to that date 752 members have signed the by-laws, since its organization in 1889. Of these 70 have died, 56 have removed from Cambridge, 30 have resigned, 145 have lost their membership by reason of non-payment of the annual assessment.

CAMPAIGN METHODS.

The work of the Association has been confined principally to the indorsement and support of proper candidates for the various municipal offices and the compilation and publication of a record of the members of the city council. This record has been compiled by paid representatives of the Association who have attended every session of either branch of the city council and included the attendance of the members at every meeting of the city council or

of any of its committees. An uncorrected proof has been sent to each member before publication, and if the changes suggested by him were found to be supported by other evidence than his statement, they were adopted, otherwise the original report was not altered. This record has been published in full in all the local papers before the caucuses were held and has also been sent to the members in pamphlet form. This work was dropped at the close of 1899, largely because the voters did not appear to act upon the information to any appreciable extent. Men with records for faithful attendance and valuable service were sometimes defeated by others whose record was less worthy of approval but who were more popular.

The campaign work begins with a special meeting to consider the various candidates nominated for the city government, which is held after all conventions have met and about four days before the final day for filing nomination papers. To this meeting none but members of the Association are admitted, with the sole exception of the reporters for the newspapers. For the use of the members, the secretary prepares ballots containing the names of every candidate known to have been nominated either by a convention, caucus or nomination paper, whether the necessary papers have been actually filed with the city clerk or not. The ballots give the residence of each candidate, his occupation, and by whom he is nominated. The action of the members is not confined to the names upon the printed ballot, the Association having always claimed the right to make independent nominations, and has exercised this right in many cases. As stated by the executive committee in 1892, "this Association exists, not to take the lead in making nominations on ordinary occasions, but rather to inform the citizens regarding candidates, and to assist the voters in making wise selections. If, however, there is no candidate for any particular office whom we can approve, it then becomes our duty to nominate an independent and suitable candidate."

The names upon the printed ballots are all read to the meeting, and the several candidates are discussed when there is a difference of opinion. Although many about whom there is practical agreement are passed without any remarks, this nevertheless gives an opportunity for the presentation of reasons for or against the indorsement of every candidate. The members then proceed to

mark their ballots, and the candidates receiving the highest number of marks are indorsed by the Association. The names of those indorsed are printed upon the official ballot under the designation of Library Hall, properly executed nomination papers being filed with the city clerk. A full report of the meeting is published in all the local papers, and a somewhat less extended report in most of the Boston papers. Candidates for any office who are members of the Association are not allowed to be present while the nominees for that office are being discussed, and they receive no more favorable consideration than candidates who are not members. It is also clearly understood that no member is bound by the action of the Association to support or oppose any candidate except so far as such action commends itself to him. It will thus be seen that the Association has to rely upon the wisdom and fairness of its action for its support. Its influence is not measured by the limit of its membership but extends throughout the city among all classes.

A campaign paper is prepared each year containing a short account of every candidate indorsed, together with such other matter as the committee in charge consider desirable. This paper is mailed without any exception to every voter whose name is upon the revised list of voters. Men were formerly stationed at each polling place with cards, signed by the officers of the Association, containing the names of every candidate indorsed, and these cards were given to every voter. Owing to a statute passed in 1895 prohibiting the distribution of such matter at the polls, these cards are now mailed to every voter. When the Association makes an independant nomination for mayor, public meetings are held and every effort is made to secure his election, but with minor candidates there is no special work done beyond that stated above. Usually, however, those indorsed are nominated by some caucus or convention, and the Association relies upon the party making the nomination to attend to the other work of the campaign, confining itself to the publication and distribution of its paper and cards.

DECLINE OF OPPOSITION.

It has been one of the difficulties in the work of the Association that the greater part, frequently all, of those indorsed have been the Temple Hall nominees or nomination paper candidates. The members of the Citizens' party, finding that the Temple Hall

nomination with indorsement of the Library Hall Association was practically the same as an election, have abandoned their organization and have succeeded for several years in controlling the Temple Hall nominations. The result has been that only one set of nominations has been presented to the voters, the other candidates being by nomination papers only. While an opposition conducted as the Citizens' at times had been is worthless as a restraining influence, it is a cause of regret that there have not been two complete sets of nominations made by two strong parties. With only thirteen candidates from whom to chose eleven officials, there has been but little room for effective work, and this has been the case twice within four years. In those cases the Association fell far short of its professions in the indorsements it made.

Since the formation of the Association ninety per cent of those indorsed have been elected, including those candidates against whom there was no contest. Unlike many reform organizations which make nominations only in those sections where there is a chance for success, the Library Hall Association at all elections has always indorsed candidates for all offices to be filled from every ward as well as from the whole city. We have made it a point to appeal to every voter and have received the support at the polls of many who have never openly shown any interest in our work.

LOCAL CONDITIONS NOT PECULIAR.

It will be urged of course that our community is a very exceptional one, that our voters are unusually intelligent, etc. While this statement may gratify our pride, it is not exactly correct. One of the greatest difficulties encountered in Cambridge is the lack of knowledge which the average voter possesses concerning the fitness of the numerous candidates. The normal ignorance of our citizens concerning the affairs of our city and the fitness of the candidates for office is as great as it is in any city. Such good results as we may have been able from time to time to secure, however, have been owing to the fact that we have not neglected any opportunity to remove this ignorance by every means at hand.

It is frequently asserted that the population is not a large one and that it is comparitively free from foreigners with very little of the labor elements. How far this is the case is shown by the following statement. The population of Cambridge in 1895

was 81,643, about two-thirds native born, one-third foreign born. The native born were about equally divided between those of native parentage and those of foreign parentage. The number of assessed polls was 22,781; the number of registered voters 12,554 men, (862 women). In 1899 the number of assessed polls had increased to 24,995 and the number of registered voters to 12,991 men (366 women). Our population is engaged in a variety of occupation of every sort including many trades and professions as well as manufactures. Our city ranks with the larger manufacturing places of the state, there having been 13,262 men and women engaged in manufacturing according to the census of 1895.

The large number of officers to be elected each year is one serious difficulty in the way of securing good government. The administration of the affairs is vested in a mayor and a city council, consisting of a board of aldermen and a common council. The board of aldermen has eleven members, who with the mayor, school committee and assessors are elected by the voters of the entire city. The common council has twenty members, who are elected by the voters of the wards they represent. The greater part of these officers are elected each year, the total each year being at least forty.

The mayor has the entire control of the executive department, but all appointments and removals are subject to the confirmation of the board of aldermen. Our elections are conducted under the Australian ballot, and the only qualifications necessary to entitle a man to vote are six months residence in the city, twelve months residence in the state, and the ability to read the constitution in the English language and to write his own name. The political division varies; sometimes the Democrats are in the lead, at other times the Republicans, while there is a large independent vote which cares very little for either party except as a means to secure desired results.

EXISTING DIFFICULTIES.

While in more than one instance our leading men have yielded their strong preferences and united in support of compromise candidates, the experience of the last ten years shows that even the most careful and apparently disinterested citizens cannot always be depended upon to act entirely free from prejudice or from social and personal influences. Men

are influenced by such a variety of motives and interests that judicial action in political matters is not likely to be attained. For instance, one year a candidate who had done good work for the cause of No License failed to secure the indorsement of the Association. An appeal in his behalf was signed within a day or two after our meeting by many of the No License members, including the first president of the Association and sent all over the city. That this was owing to their bias in favor of No License is clearly shown by the statements contained in that appeal as well as by the determined opposition which these members have since shown to his re-election. Another year, influenced as I believe solely by social considerations, many influential members of the Association presisted in pressing the re-election of a mayor who had, to put it very mildly, neglected the duties of his office and whose administration was unsatisfactory to a very large part of our voters. This they did when it was well known that such action would cause a division among those who had always acted together and thus destroy an opportunity which they freely admitted did exist to effect a greatly needed improvement in the membership of our City Council.

In recent years our city government has been practically free from corruption, but the ability of its members has not been equal to that of former years. While those elected are as a rule honest, well-meaning men, they do not compare either in ability or experience with those who filled the same positions in former years. It is unfortunately true that there is a growing disinclination to accept public office on the part of men accustomed to deal with affairs of the importance of those of our city. How far the change in the direction of depriving the city council of any direct control in the management of the several departments has contributed to this result is a serious question. The ability of corresponding officials abroad and the ability of our own city councils thirty years ago incline me to believe that this change is responsible in part at least. It may also be due in part to the greater demands which business makes upon successful men to-day, rendering it less possible for them thus to serve the public. In addition, the present caucus system acts as a very strong influence to prevent many men from seeking or accepting nomination for any office.

The Association has done much good in the past, but there is

a possibility that it will not continue to do so in the future. Many of our members who will give freely of their means will not give of their time what is necessary to organize and strengthen the work of securing and maintaining an efficient city government. From thirty to fifty per cent of the members (varying with the interest excited) do not even attend the meeting held to indorse candidates. It is perfectly certain that good city government cannot be secured and maintained without constant and unceasing effort on the part of disinterested citizens in that direction. Without this labor intelligently directed and controlled no form of government however modern will give good results.

WHAT NEXT?

The experience of Cambridge shows that until the population reaches a certain total it is practical to secure and maintain strictly municipal parties. What to do after that total is reached, is the question which now confronts us. Parties cannot be upon such strict lines as those in national affairs, because the questions upon which citizens differ in local affairs change from year to year, in many cases it being a purely personal one between candidates only, and the membership will be found to be a constantly shifting one for that reason. We have, however, now reached the point where the question of having any parties in municipal affairs is a matter of grave doubt. The number of voters has now grown so large, there are no halls which will accommodate the caucuses held in several of the wards, and the caucuses have consequently degenerated into simple primary elections, the element of discussion having been entirely eliminated. Unless some attempt is made to lessen the number at each place by a system of precinct caucuses, thus restoring the discussion which formerly characterized these meetings, the present primary elections are a useless waste of time and energy and much better results will be reached by having all candidates nominated by nomination papers only, abandoning all party machinery, municipal as well as national, in our local elections.

POLITICAL CLUBS IN PRUSSIAN CITIES.

By Robert C. Brooks.

[Note.—In an extended article, published in the last September number of Municipal Affairs, Mr. Brooks described the official machinery of Prussian city elections, according to which the voters are divided into three classes on the basis of direct taxes paid. The first of these classes is composed of the relatively small number of heaviest taxpayers who together pay in one-third of the total amount of direct taxes collected; the second includes the considerably larger number of next heaviest taxpayers also to a third of the total amount, while the third class embraces the residual mass of small taxpayers and also those members of the propertyless classes who are admitted to the suffrage. As each of these classes is assigned equal weight in an election, the result is obviously to concentrate voting strength in the hands of the large taxpayers. In the present article Mr. Brooks completes the discussion by describing the primary election machinery employed.—Editor.]

Scarcely less interesting than the legal machinery prescribed for Prussian city elections are the voluntary associations of citizens for municipal purposes (*Kommunal Wahlbezirks Vereine*). Unlike the multifarious good government clubs, civic leagues, etc., with which we are familiar in American city campaigns, these organizations are permanent, and maintain the same interest and membership in off as in election years. The nomination of candidates for the council and the conducting of campaigns in their behalf is only a part of the work which they attempt to do. Of far greater importance is the intelligent interest which they stimulate in municipal affairs, the criticism to which they subject city officials and the preparation they give their members for future activity in the council or in the numerous unpaid offices which form so admirable a part of Prussian city administration. Partisan activities and political education here go hand in hand. The notion prevailing in this country that Prussian city politics are free from the influence of national parties needs considerable correction. It is true that the alignment of parties in municipal campaigns differs from that prevailing in national and imperial politics. For this reason statistical returns showing the party membership of voters in city

elections are impossible. Party lines are by no means obliterated, however.[1]

In Berlin the influence of national political parties is seen at its highest development. Nearly all the municipal election district clubs in the Prussian capital bear not only the names of the districts in which they are located but also of the national party from which their membership is drawn. In the smaller cities of northern and eastern Prussia, we generally find the liberal elements massed together in opposition to the social democracy, while in the Catholic provinces the same elements stand opposed to the *Centrum*. Both the socialist and the *Centrum* party organizations control directly the nominations and campaigns of their candidates for city councils. It will thus be seen that outside of Berlin the two party principle is general in Prussian municipal elections, although this is, of course, very far from being the case in national and imperial elections. The fundamental basis of division into municipal parties is nevertheless fixed by the influence of national parties.

The activities of these municipal election district clubs and the sort of influence they exert on Prussian city government may perhaps best be made clear by selecting a typical case afforded by the growing industrial and university city of Halle, with which the writer is personally familiar. Here the Liberal elements are perpetually fused in opposition to the Social Democracy. Inasmuch as the latter party, owing to the operation of the three-class system, has no chance of success in the first and second classes, we find the Liberal organization in opposition to it confined almost entirely to the third class. In the first and second classes in Prussian cities generally, it should be observed that there are seldom any permanent organizations for political purposes. The number of first and second class voters is so limited, and the differences of

[1] Occasionally complaint is made of the influence of national parties in municipal elections. The following extract from the official report of the city of Iserlohn for 1894-5 (population 23,962) will sound strangely familiar to American readers. "Of the twenty-seven members of the city council, thirteen belong to the *Freisinnige*, eleven to the National Liberal and three to the Catholic party. The recent city elections exhibited the same unpleasant features that have characterized them for years past. Party membership counted for more than ability and understanding of municipal affairs; personal attacks were unsparingly made upon political opponents, and the most private affairs were exposed and dragged into publicity to the joy of scandalmongers. It is sincerely to be hoped that the better element among the citizens of Iserlohn will rouse itself energetically and put an end to such practices, which are directly calculated to harm the development of communal interests and to injure the good name of the city."

opinion on municipal policies prevailing among these coteries of the rich are so slight, that they usually find it sufficient to meet in caucus a few days before an election for the nomination of candidates for the council. It seldom happens that much disagreement is developed at these meetings and the nomination of a rival ticket by bolters is extremely uncommon. Indeed the principal difficulty seems to be to find candidates in accordance with the political opinions of the members of the first and second classes, who are willing to accept the by no means light duties of a councilman. In the third class, however, the opposition of the Social Democracy to the fusion of liberal parties is very strong, and in the workingmen's districts their candidates are not infrequently successful.

To meet these conditions the liberals of Halle have organized permanent election district clubs in each of the five precincts into which the city is divided.[1] The membership of the clubs is not large compared with the total number of voters in the districts. Thus in the Third Election District Club, there were in 1897, 300 members as against 4,044 qualified voters of the third class living in the district. In general, however, the membership of these organizations may be said to include all citizens of liberal tendencies who take an active interest in municipal affairs. As the policy of the clubs is approved by voters of liberal principles generally, their influence in an election is not to be measured by the size of their membership rolls alone. Nominations for the council are made by the clubs at the regular monthly meeting preceding an election, each member present having one vote. Ordinarily the choice falls upon some member of the organization who has developed qualifications for the office of councilman through long and active service in the club.[2] Sometimes public meetings of the liberal voters of the district are called by the clubs to ratify the nominations so made. If a candidate is elected, he still retains his membership in the club and is often called upon by his

[1] The constitution of one of these clubs is given on pages 383 and 384.

[2] The following translation of a manifesto issued to the voters of the fifth election district of Halle in 1897 is interesting as showing the way in which the clubs call public attention to their candidates and to their special fitness for the office of city councilman:

"TO THE VOTERS OF THE THIRD CLASS IN THE FIFTH ELECTION DISTRICT."

"The election for members of the city council from the third class of our district "will be held in the Thalia Theater on Monday, Tuesday and Wednesday, the 22d, "23d and 24th of this month [Nov., 1897.]

"The undersigned most respectfully urge you to appear at the polls, and to vote

colleagues to explain his official acts or to inform them concerning the policy of the city government.

The agitation undertaken in behalf of municipal candidates would hardly justify the name from the American standpoint. Special meetings of the clubs are sometimes called, at which addresses on the local questions at issue are made, but there is no unusual excitement, no electioneering on the part of professional politicians, nor does the press cram its columns with election news to the exclusion of almost everything else. In case the first ballot results indecisively, dodgers may be gotten out in order to bring out the full party strength at the narrower contest that ensues.[1] The socialists particularly distinguish themselves by their electioneering zeal. Often common laboring men belonging to this party go to the factory doors at an early hour in the morning in order that they may ask their comrades passing in to remember to do their duty at the polls. Others work all day long about the election *Lokals* distributing tickets. The loss of wages involved

"on one of these days, in order that the Citizens' [Liberal] Party may this time be "successful in our district as it has ever been in the past.

"In order to prevent a splitting of the vote, we take the liberty to commend to "you two generally acceptable and well qualified candidates, Messrs. Gustav H—— "Market-gardener, and Ludwig G——, Master-mason.

"Mr. H—— has already served six years as member of the council, and has "proven himself eminently worthy of his trust. He has never failed to cast his vote in "accordance with the interests of his constituents. It is therefore nothing more than "an act of gratitude on the part of the voters of the third class to re-elect Mr. H——, "who has signified his willingness to accept a re-election.

"Mr. Ludwig G—— has for years taken an active interest in municipal affairs "and has ever worked with untiring energy to further the welfare and progress of our "city. We are convinced that Mr. G—— will act and vote in the city council entirely "in accordance with the will of his constituents. For these reasons we cordially "endorse his candidacy.

"With the request that this call may receive your earnest consideration, etc.

"Signed,

"The Fifth Municipal Election District Club.
"The Remaining Municipal Clubs.
"The House-Holders' Union."

[1] The following is an example of a political notice of the above sort which was used in the city election of Halle in 1897:

"TO THE VOTERS OF THE THIRD CLASS IN THE FIFTH ELECTION DISTRICT.

"As a result of the indecisive council election in the third class, fifth district, a "second contest between Mr. Ludwig G——, candidate of the Citizens' Party, and Mr. "M——, Social Democrat, has unfortunately become necessary.

"We therefore request you most urgently to appear at the second election to be "held in the Thalia Theater on the 13th and 14th of December, from 9 to 4, and to cast

must be a much heavier sacrifice for them than the loss of time to the workers of parties whose adherents are in more leisurely circumstances. For this reason, and also in order that their full party strength may be more easily brought out, the socialists advocate the holding of all elections on Sunday.

It is the ordinary everyday work of the election district clubs, however, which accomplishes most for the good government of the city. In addition to the organizations in each ward, there is also in Halle, a Citizens' Union for City Interests (*Bürgerverein für städtische Interessen*) whose membership (423 in 1898) covers the whole city, and is recruited from the same classes of citizens who interest themselves in the clubs of their own district. Between the local and general organizations there is a sort of division of labor. All questions affecting a single ward are naturally discussed only in the club of that ward. Questions of interest to the whole city may be, and frequently are, given a preliminary discussion in the local organizations, but in the end they are carried before the general Citizens' Union, where they are discussed by residents from all parts of the city. The scope of the questions coming before these clubs is extremely broad, ranging from the somewhat pointed demand which a single member may make upon the councilmen present to explain why the gutter before his house has not been cleaned in a fortnight, to the discussion of a proposition for the municipalization of a street railway or an electric lighting plant. Some of the subjects recalled at random from among those heard discussed in Halle are the following: the letting out of contracts by the city; the annexation to the city of the suburb, Giebichenstein; the establishment of a trades-school; public playgrounds for children; condition of the public market; hygienic condition of city school buildings; advertisement of the advantages of the city for residence and business purposes; the widening of certain narrow streets in the center of the city; plans for the erection of a monu-

"your vote for Mr. Ludwig G——, so that our district may not be represented in the "council by a social democrat, a thing which has been so brilliantly prevented in other "districts of our city. Voters of the Citizens' Party, close ranks and the victory is "ours." Etc., etc.

"Signed

"The Fifth Municipal Election District Club,
"The Remaining Municipal Clubs,
"Union of House and Landholders,
"Citizens' Union."

ment to Emperor William I.; increase of crimes of violence within the city limits and preventive measures to be adopted. Occasional lectures on municipal topics were given before the clubs by distinguished specialists, dealing with such subjects as the following: Result of Prussian Educational Statistics for the years 1891–6; Advantages and Value of Food Inspection; Electrical Central Stations; School Medical Boards; Halle in theMiddle Ages. Reports of the various departments of the city government were discussed as they appeared from time to time. Visits were made to the different public works of the city either by all the members of the club who wished to go or by committees which reported afterwards. Even social amenities were not forgotten by these versatile organizations, each of which arranged one or two pleasure parties in the course of the year to which the members brought their ladies.

The list of club activities cited above may seem so comprehensive as to lead one to the suspicion that they are mere dilettante organizations. Nothing could be more incorrect. The business-like solemnity of some of the meetings would be unbearable even for the staid German members, were it not for the constant ministrations of the *Kellners,* while the volumes of smoke expended over some knotty question of municipal policy can be compared only to the historic cloud proceeding from the pipes of the old Dutch aldermen of New Amsterdam which once completely covered the city and saved it from capture by the English. Through the work of the clubs it seldom happens that any important measure comes before the city council without having been pretty thoroughly canvassed by them in advance. They do not hesitate to place themselves decisively on record on a given question and afterwards to require a strict account of the official acts of their representatives. That they accomplish a vast amount of good is unquestioned. Administrative officials are sometimes wont to grumble at their "pernicious activity," but this is entirely to their credit. It needs just such an agency as these wide-awake voluntary clubs to keep the Prussian bureaucracy from relapsing into hopeless red tape.

Students of city government often deplore the disappearance of the old town-meeting system which was the inevitable result of increasing urban population in America. These Prussian election district clubs supply an excellent substitute for such earlier assemblages of all the citizens of a town to deliberate over common

affairs, a substitute, moreover, capable of operation in the largest cities. That such organizations are unofficial does not detract one jot from their effectiveness. That they can live in a partisan atmosphere is proved by the fact that they are themselves partisan organizations. In Prussia they are preserved from degeneration by the impossibility of using their influence to promote members to offices of profit, even if they should wish to do so. They can affect the administration only indirectly through the city council, and administrative officials are amply protected by an excellent civil service system. It would be interesting to speculate about the possibilities of usefulness open to permanent organizations of this sort in American municipalities. Space prevents our entering further upon this question than to note that good results could be obtained only by the exercise of a considerably more studious and considerably less spasmodic attention to municipal affairs than has hitherto manifested itself in our cities. With the growth of intelligent interest in municipal government this condition would perhaps not be so difficult to realize. But in addition to this, absolute non-participation in the business of place-hunting would be necessary, and perhaps also an increase of power vested in the hands of a city council whose members, as in Prussia, were unsalaried.

In Berlin, as has already been mentioned, clubs for municipal purposes take on a more decidedly national party color than in other Prussian cities. This accounts in part for the great number of such organizations in the German metropolis. The annual statistical reports of the city contain lists of all such clubs. Their number in 1896 was seventy-five, of which fifty, with a total membership of 13,553, filled in the return slips sent them. These fifty clubs held in the course of the year 559 meetings. The average yearly contribution of the members for club purposes amounted to two or three marks, fifty or seventy-five cents in American money. Some of the clubs maintained death benefit and savings bank features, and others made small donations to charitable institutions. The permanence of these organizations is sufficiently evidenced by the fact that of the seventy-five in existence in 1896, one had been founded before 1850, four between 1850 and 1860, twenty between 1860 and 1870, thirteen between 1870 and 1880, twenty-eight between 1880 and 1890 and the remaining nine since 1890.

Inside the city councils we find the same lines of division pre-

vailing as in the electorate outside. The Social Democrats stand quite apart, irreconcilable and vindictive as in the Reichstag. They vigorously champion in season and out of season all propositions for municipal ownership, improvement of schools and dwelling houses, etc. Opposed to them are the Liberals of all shades and the few Conservatives who are elected to city councils, for conservative strength is mainly centered in the rural districts east of the Elbe. In the Berlin council the members are divided into a number of more or less distinct groups as follows:

Social Democrats	about	14 members.
New Left (*Neue Linke*)	"	30 "
Great Fraction (*Grosse Fraction*)	"	50 "
Lower Fraction (*Untere Fraction*)	"	20 "
Independents (*Fractionslos*)	"	11 "
Anti-Semitic Party	"	1 "
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The great majority of the members of the New Left and Great Fraction are *Freisinnige* in national politics. The New Left however stands closer to the Social Democracy, demands their equal treatment and admission to municipal administrative offices and favors municipal ownership. The Great Fraction, so called because its membership is larger than any other, is less liberal, and includes so many different elements that its position on municipal questions is rather hard to define. It is indeed more given to political maneuvering than to the representation of a definite set of principles. On the question of municipal ownership it is divided, but most of its members are either indifferent or opposed to all movement in this direction. The Lower Fraction, also called familiarly the *Keller Fraction*, is composed of the handful of National Liberals and conservatives in the Berlin city council. They are distinctly against municipal ownership, and generally support the royal authorities in any action they may undertake against the city government under their rights of supervision and confirmation. (*Aufsichts- und Bestätigungsrecht.*) In addition to these groups, there is a handful of Independents who own allegiance to no fraction, and one forlorn Anti-Semite. The *Grosse Fraction* holds, of course, the balance of power and the great question in Berlin city politics is to secure its adhesion to any proposed measure. The conduct of the groups on the floor is generally determined in caucuses held beforehand, the members after-

ward voting as a unit. The fate of any motion can thus be predicted before the final vote is taken by any one who knows the results arrived at in these unofficial preliminary conferences.

To illustrate the form of organization generally adopted by the municipal election district clubs, a translation is subjoined of the constitution of the Fifth District Club of the city of Halle as last revised in 1894.

§ 1. It is the purpose of this club to discuss, take action upon, and arouse interest in the public affairs and councilmanic elections of the Fifth Election District and the city of Halle as a whole, and at the same time to foster and promote the spirit of true neighborliness.

§ 2. Every resident of the Fifth Election District possessing the right of citizenship in the city of Halle may become a member of this club. Persons moving into the Fifth Election District who possessed the right of municipal citizenship in their previous place of residence, or were qualified to vote in communal elections in the country, may also become members of this club, provided they have signified their intention of acquiring the right of municipal citizenship in Halle.

Application for membership must be made to the executive council of the club or to one of the members thereof.

The executive council can refuse an application for reasons of weight. After payment of the initiation fee, (§ 4) and of the regular contribution for the current year, a certificate of membership is to be handed the applicant and his name entered upon the membership roll.

§ 3. Membership lapses:

(a) through resignation from the club, or death;
(b) through failure to pay dues for the current year;
(c) through expulsion by the executive council for reasons of weight;
(d) through loss on the part of a member of the right of municipal citizenship.

In the case of 3c, a resolution of the executive council passed in secret session by a majority of at least five is necessary for expulsion. The member so expelled may bring the matter before the next regular meeting of the club. With loss of membership all claims upon the property of the club are extinguished.

§ 4. New members must pay an initiation fee of 50 Pf. (12½ cents). The ordinary expenses of the club must be covered by a yearly contribution levied upon the members, the amount of which is to be fixed for the following year at the regular monthly meeting of the club held in December of each year. This contribution, however, may not exceed the sum of 1 M. (25 cents) per year. Extraordinary expenses arising during the year may be met by special levies voted at a general meeting of the club.

§ 5. A general meeting of the club must be held in the first half of the month of December each year, at which accounts for the year must be presented and elections for members of the executive council for the succeeding year must be held.

Besides this, the club must hold at least one session a month during the year.

The executive council shall fix the date and place of all meetings.[1]

Invitations containing order of the day for all meetings are to be issued by the executive council in whatever manner it may deem fitting.

[1] Meetings of the election district clubs are generally held in the private rooms of some well-known beer *Lokal*. No rent is charged by the proprietor, who expects to be reimbursed through the purchases of the members.

In all meetings of the club a simple majority vote will be sufficient for the passage of resolutions, except in the cases mentioned in § 7.

§ 6. The executive council shall be composed of a chairman, vice-chairman, a secretary, a treasurer and three associates. The members of the executive council shall divide the offices and business of the club among themselves.

The members of the club shall vote separately for the chairman; the other members of the executive council are to be elected together. The method of holding these elections is to be determined by the club in general meeting assembled. The members of the executive council are to be elected for terms of one year, re-election is permissible.

The chairman represents the club officially in all its external relations. In case of a tie vote, his ballot decides.

In cases of great urgency the executive council may make expenditures for extraordinary purposes to the amount of 20 M. ($5.00). In all such cases the approval of the club must be secured at its next regular meeting.

§ 7. The dissolution of the club or the amendment of its constitution may be effected by a vote of two-thirds of the members present at a general meeting of the club.

Extraordinary meetings of the club must be called if a written petition signed by ten members and calling for such a meeting be handed to the chairman fourteen days in advance.

The chairman of the club, with the consent or upon the motion of the members of the executive council, may call an extraordinary session of the club at any time.

RELATION OF THE CHURCH TO MUNICIPAL POLITICS.

By Thomas R. Slicer.

The two extremes represented by the question implied in this title are both represented in the history of the American commonwealth. The ideal of the Plymouth colony was a theocracy as genuine and as insistently real as any which marked the earlier stages of the history of the Jewish people. To the Jew of the days of Amos, Micah and Isaiah, God was king, and God's people a divinely appointed instrument of his power. The prophet was not simply a religious teacher, but a statesman; and his most strenuous appeals to Israel were not simply for personal righteousness, but for righteousness for the sake of the state. The earliest colonial development in this country was along the same lines; and it will be recalled that until the adoption of what was known as the "half-way covenant," no one could vote in the affairs of a town who was not a member of the religious organization which centered in the parish church. Until the middle of the present century, the rule prevailed in Massachusetts, that the parish church should be supported by an assessment levied upon the income of every member of the parish.

The other extreme, viz., the entire separation of church and state, which became a virtue in the eyes of the Puritan, has degenerated into an opposition to the church and all political alliances, which in this country has had a tendency to make the minister of religion that member of the community least informed with respect to the political life of the community that he serves. A fresh occasion of repugnance to the "minister in politics" was gained during the years just preceding the Civil War; and in the state of Massachusetts, where the abolition movement had its birth, men were excluded from their pulpits for the advocacy of the emancipation of the slave; while in the South in the same period, the "divine institution of slavery" was proved by scripture texts, quoted in the sermons of the preachers of that day.

Of late years there has been a growing feeling in the community that citizenship was itself so sacred a function that the church and its minister could no longer ignore its claims upon them without losing power; and it is now generally conceded by thoughtful people that the struggle in municipal politics is a struggle simply of good and evil, of virtue against vice, and that therefore the balance of power must either be held in the hands of men of righteous ideals, or else committed to the hands of those whose self-interest and appetite for spoils makes the city the prey of their cupidity. The lead in reform is now looked for among the ministers of religion and the representative laymen of the churches; and it is the purpose of this article to briefly set forth the reasons for this relation between the church and municipal politics.

First. The church concerns itself with the business integrity of its members. No church can live and wield any influence for good which is made up of men whose business integrity is questioned. So much is this felt that the keenest reproach attaches to that man who is a member of a church but who has no good standing in the commercial circles of his community; for the church really is to be judged by the integrity of its membership in common life; and therefore the recognition by the church that the municipal administration is simply a form of business compels the interest of the church in that administration.

The use of the term politics as applied to the municipality is the ancient use of it, viz., the administration of the city, and not the modern use of it, an expression of party feeling, prejudice and opinion. In this last sense there is no place for politics in the municipality. No issue of national politics has any standing among the interests which affect the city's life. There is no department of municipal administration which can be said in any real way to be affected by the issues between the great parties in national politics. The city as to its administration has three functions: (1) it has common interests as to business; (2) it has mutual interests as to order; (3) it has inseparable destiny of all its people, as to the happiness and misery of its inhabitants. The public business is only an aspect of the general business carried on in that great aggregation of human life called a city. In order that there may be equal justice there must be perfect order; and that the grind of business and the keeping of order shall not take

up the whole of human life in a city, provision must be made by the city for the culture, education and delight of its citizens.

It would seem to need no proof, that if the church is concerned with business integrity, it cannot be excluded from interest in any one of these departments of municipal administration. The moral integrity of the whole is made up of the personal integrity of its parts; and the church certainly should contain, if it is true to its function, the best representatives of personal business rectitude. The church cannot recognize that common fallacy that a man may have "every private virtue and every public vice"; and one relation of the church to municipal politics should be its stand against the public vice of officialism, as inconsistent with any personal virtue of the individual. "What a man owes to everybody is more than that he owes to anybody"; and the church owes it to the conscience of the community to insist that there can be no difference in the stealing of a purse and the waste of public money, except in the amount appropriated to private enrichment. The officials who sign a contract to loot the public treasury are not relieved of the charge of being a gang of thieves by the fact that they have taken the oath of office. They are not excused by having added perjury to dishonesty. If the church has no message on this subject, it would seem that it has no word to speak in behalf of the common interest of daily life.

What is true of the business aspects of the city's life is true of the preservation of order, as seen in the regulation of the strong, the suppression of the vicious and the repression of the evidences of vice. Surely the church has some mission in this direction. If it gathers tribute from corrupt office holders, who are protecting vice, or if it allows such people standing in its membership unrebuked, then it becomes a partner in the business of blackmail, it condones the offences which it should condemn, and is supported by the very vices which it should reprove. It would seem as though it might be the church's business to cry aloud against the disorders of society, and reprove the unfaithfulness of those in the community, who being guardians of the peace, are actually promoters of wrong-doing.

The third department of this business aspect of the administration of the city, viz., the provision for the culture, education and happiness of its citizens—ought also to be the church's affair. If there is anything in spiritual culture as represented by the church,

it should appear in the refinements of life. If there is any virtue to be associated with knowledge, the church should certainly be active in promoting the best education of the citizens; and unless the church is meant to be simply a terror to evil-doers, and a horror set over against pure delights of life, then the pleasant places of the city—its parks for children and the poor, its provision for innocent amusement would seem to be a fit field for the church's activity.

Second. The real business of the church is the adjustment of human relations. If it conceives its duty to be the preserving of a secret told to a few, and under right conditions to be repeated by them to a few more, it is quite possible to make a self-complacent club; but it is not possible to think of it as a church. The worship of God cannot be dissociated from the service of man. The vocation of the Hebrew prophet was seen in the moral passion with which he sought to bring about better conditions in the common life of his time. The minister who is remote from the daily life of people may enjoy the retirement of his cloister, but long seclusion in its dim light will unfit his vision for the common day. It fell upon the Roman world with surprise, when in the play of Terrence the sentence was uttered; "I am a man, and nothing that is human is foreign to me;" and the *homo sum* of that altruistic sentence cannot be ignored by any modern minister without loss of power, and detachment from common interests. The passage from the denial of the manliness of the modern minister to the emasculation of his influence would not seem to be a very long one. The church is therefore now no longer an enclosure for saints, but a school in which human relations are adjusted by the standard of common interests, and regulated by divine ideals. Municipal politics is simply regulated human life, in which the interests of all and the protection of each unite to offset the dreadful risks which come with great aggregations of population and the sharp contentions of business enterprise; and the church, as an ideal republic, should seek to repeat itself so often in the community as to make the community itself a federation of such well-regulated commonwealths.

Third. The church should be the first to detect and to rebuke vicious administration in the city where it is set. It may be said that this is difficult, because the wealth which corrupts municipal administration pays its tribute into the coffers of the church; that

the great corporations who pay for protection, and own their henchmen in the municipal assemblies, are necessary to the church's life; that members of these corporations are found prominently supporting the churches, and dictating the terms in which the minister shall speak. This sweeping charge which is often met has some basis of truth, no doubt, but it claims no interest from any man who really understands what the church is, and what it ought to do.

It needs no argument to show that the minister who is limited by the dictation of any man, or set of men, in his congregation, has ceased to be a prophet, and has come to be a puppet. No self-respecting minister takes any dictation from the people of his church as to what he shall say, any more than he expects their criticism as to how he shall live. His life is his own, and his mind is his own, and his conscience governs both. Preaching is made up of three things; the conscience which compels it, human interest which invites it, and the experience which instructs it, and these are within the keeping of the minister himself, and cannot be invaded from outside. No man is fit for the pulpit, as a teacher of righteousness, or a minister of religion, who does not stand ready every hour to sacrifice his position, rather than his influence. There may be men who say what is expected of them, but for the most part the ministers of religion expect of themselves a different standard of action; and on all public questions that touch the life of the community, the pulpit should "give forth no uncertain sound"; and for the most part we think it fulfills this requirement.

The reproach that the minister is a "professional reformer" is a distinction; for it is part of his business to re-form what has lost its form; and it is his "profession" to do this so constantly as to make it his habit. The reproach that such action upon his part is "inconvenient" dates back of Puritanism, back of St. Bernard, back of Gregory the Great, back even of the apostles and their Master, to the struggle between the prophet and the priest, and between reality and sham in the history of the people of God. It ought to be possible, when any question of injustice arises in a community, when the community is dominated by vicious influences, when officialism of the municipal life leads to a lax construction of public morality, to have every church in the community a unit of power to oppose conditions which multiply temptation and

seduce from virtue; and the church that does not lift its voice under these conditions in protest, pleading and with power, does not understand its relation to the moral life of the community which supports it and protects it.

Fourth. By general consent the church is relieved of taxation by the municipality. Its minister is lifted out of the sharp competitions of trade, that he may give all his time and dedicate all his power to the better life of men. The church and the minister, therefore, owe some real return to the community at large, for this concession made by the community to the maintenance of the church and its ministry. There should be no exemption from taxation allowed to the religious organization that does not justify this exemption on the ground that the church is a public benefit. It cannot be a public benefit by simply secluding a small group of the community from the sympathies of the communal life; and the minister who is taken out of trade and business to be maintained in his usefulness, should find in that usefulness to the community as a whole a larger commission than can be found in simply serving the little group who have so secluded him.

The church exists for the sake of the community, and the ministry should be reckoned among the community's first citizens. It is quite possible that there should be between the minister and his congregation a difference of opinion upon grave economic questions; but these questions do not pertain to the municipal life. No question of the tariff, or the national currency, or the relations of the government to our new dependencies, or the establishment or maintenance of international relations, could ever intrude upon the field of municipal politics in any way which would affect the life of the municipality itself. The questions at issue are all questions of common morality, of business integrity, of personal administration, and of personal character; and these are all questions which the church should be able to deal with, and in which the minister should lead.

If this is not so, it would be interesting to have some one define what is the church's business and what class of questions the minister should take up. The most useless survival in modern life is that form of church organization which represents a class busy with theological definitions, by virtue of which it hopes to "save the soul." If the great body of the unchurched were consulted as to the cause of their aversion to the life of the church, it would

probably be found that they have slipped through the weak hands of religion, or they have been estranged by the averted face of religion which has lost a wholesome interest in human affairs, whilst it cultivated an other-worldliness to this world's neglect. You cannot go into a great assembly of working people without discovering antipathy to organized religion among people who at the very same time will applaud to the echo the name of the great founder of the Christian Church. They understand perfectly well the difference between the Jesus of history and the Christ of theology. They are not estranged from the first, but they have simply lost interest in the other. Unless the church is the brotherhood of the common life, it will prove itself unfit to take part in the commonwealth.

Fifth. The relation of the church to municipal politics, therefore, should appear in *the readiness with which people that are consistently of the church are persistently enlisted in the affairs of the city.* The man who holds to the church should not refuse to serve on the juries of the city; the man who contributes to the church should not be a dodger of the tax which he owes to the city; the man who is always at the church service should with equal regularity appear at the primary; and as between the primary and the prayer-meeting, the primary should take the precedence, should they fall upon the same day. The man who has an opinion about the salvation of the soul should have some conviction about the benefit to the bodies of his fellow citizens. The man who houses himself in a beautiful temple should not refuse to serve on a tenement-house commission. The man who claims to understand what theological exactness requires should have an opinion upon the charter by which the city is governed; and if it should happen that the mayor of the city, its board of councilmen, its heads of departments, are all or any of them unfit to represent the righteousness for which the church stands, it ought to be at the same time proof that they are unfit to represent the best interests of the city, which is maintained by righteousness or else declines.

There is no relation between moral beings that can be other than moral. The conditions under which a public contract is invited, awarded and filled, are all moral conditions; they are in no sense mechanical. There is no police regulation, however, trivial, that is not grounded in the theory that the moral life of the community is the safe life of the community. There is something

almost humorous in the claim made by the church that it has to move out of a neighborhood because the community has become so bad that it cannot possibly hold its services in the midst of it. It is a very ancient ideal that the people "shall be all righteous." To make this ancient ideal a reality there is no quick or easy method. The church has long been recognized as the instrument to this end. Undoubtedly now vast numbers of people are righteous without the help of the church. If the church is simply a police regulation for restraining men, great numbers of men will prove to it that they are self-restrained without its help; but if the church at large will take an active interest in promoting the welfare of men, there is no reason why all serious people in a community should not co-operate with it to that end. The municipal administration is simply an enlarged business growing out of the old town meeting; and the old town meeting was at its best when all the citizens of the town gathered on equal terms around common interests, and when it was true of these representative citizens as Emerson said of Judge Hoar of Concord, that "when he left the bench and sat down in the town meeting, Honor came and sat down with him."

There can be no good reason why the best citizens of a community should give power-of-attorney to the worst elements in a community, to administer the interests which for that community are common and universal; and there is no place in which the conscience of the best citizens ought to be more easily reached, or more thoroughly aroused, than in the churches of the community; for unless the church in its relation to municipal politics represents more than a dike to keep out the flood, its activities will degenerate into a mere repair of its own defences, solicitude about its own maintenance, and final exclusion by its own act from the great world of life, in the city whose very energies shall thus become more sacred than the church's selfishness, and which shall eventually work out its own salvation without the church's aid. *We believe the church is necessary to the highest life of the community, but it will only be reckoned with, as the leader of that community's thought and life, when it really leads.*

The question should arise in the mind of a reader who wishes to make the foregoing statement practically effective, how the church is to take part in municipal politics. In order to carry out

the spirit and motive which has been outlined above, the following, among others, may be suggested as methods:

First. The church must be attractive enough by the virility of its ministry and the practical character of its teaching, to enlist in its constituency men, as well as women and children. A congregation made up of women and children will undoubtedly be religious and interesting as a field of religious work, but the tendency of men to leave the services of religion to the gentler sex is due to the fact, that men are interested in this world in a way that makes it difficult for them to dismiss all worldly interests under the ministry of an "other-worldly" minister. If the Kingdom of Heaven is to be made out of the commonwealths of earth, it must provide for "strength and beauty in His sanctuary." "The pomegranate and lily" garniture of the temple of Solomon appears as delicate beauty upon the pillars of its strength. The church is entitled to the best service of the manhood of the community, but it has no right to claim it unless it can offer in exchange the inspiration to manliness.

Second. The minister of a church must know something about affairs. He should be as carefully trained in sociology as he is in theology; and the necessity for this has appeared, even in the last ten years, in the endowment of chairs of sociology in the divinity schools, from which ministers are to be put into the work of the social life of the community, and equipped both by knowledge and experience for practical affairs. The minister is permitted to be a mystic, but the mystic who is effective in this period is one who can answer a large proportion of his own prayers. Even the most mediaeval of ministers may be exhorted to go back to the very beginnings of revelation, and to remember that in the story of the Genesis, the command was given to Adam to "dress and keep the garden"; but when he simply devoted himself to consuming its forbidden fruit, he dressed himself and lost the garden. Banishment with clothing is hardly a substitute for the supremacy over the beasts of the earth. One has only to observe the way in which the pot-house politicians and the ward-heelers run to flashy clothes to recognize the survival of this ancient "fall," in municipal politics. It becomes the minister to set an example of decent living and knowledge of men which shall show him still in command of the brute forces of life in the interest of righteousness.

Third. Every church that has young men in its constituency

should gather them into classes, or clubs, where the affairs of the city are discussed—clubs upon contemporary events, classes in city history. It may be that a church is so well constituted that its young men do not need its guidance; in that case, it should put its work into some other section of the city, either by social settlement or civic clubs, that the instruction may be carried further afield, and into sections of the city less fortunately conditioned. It would be difficult to imagine a more useful thing to be done than for a church to put its strength into the educational lines of civics, in the more densely populated parts of New York City, or in any great city like New York; and it is vastly to the credit of the city of New York that they are doing this very thing. The passage from ethical passion and moral intensity, as to the betterment of the community, to real goodness on the lines of personal character is a passage easy to be made.

This work of rescue from ignorance, by means of education in civics, not only will bring to the church a sense of increased responsibility, but it will help to bridge over the interval between the church and the unchurched. It is a melancholy reflection, that what is called the "submerged tenth," and what is really a much larger fraction of every religious community, is made up of people who have either in their own lifetime, or that of their immediate ancestors, been identified with some church, actually or nominally; that is,—they are not pagans, they are not heathen people,—they are people who within the last one thousand years have been controlled and influenced by the church, but who are influenced no longer, and many of whom have come into the care of the city as belonging to the delinquent or defective classes. A moment's reflection will show this to be true; and every church worker in the midst of a great city has only to take the census of those upon whom he works to discover that this lamentable fact is chargeable somewhere, at some time, upon the separation of the church from municipal affairs.

SETTLEMENT HOUSES AND CITY POLITICS.

By Robert A. Woods.

There is danger that settlement work in its relations with municipal politics will be hindered by the traditions of past efforts in the direction of municipal reform. Municipal reform has often been strong in the role of opposition, but thus far it has not been able to devise a method which would have the responsible qualities of permanence and effectualness.

It is, of course, still true to a considerable extent that municipal politics is so corrupt as often to leave to the honest citizen with a sense of public duty no recourse but that of outright and determined hostility. In due time, however, we must develop a type of politician having at once the high devotion of the reformer and the patience and tact of the practical man of affairs. Nothing could be more vain than the hope that by fine appeals to civic sentiment and by new elaborations of charters and departmental technique, we can effect a complete transformation into a regime of administrative purity and efficiency. The attacks of the reformer on the strongholds of municipal political organizations serve, of course, to keep those organizations from going to certain extremes. The real advantage of this result, however, is not in the slight gain made for better government in itself considered, but is rather in the way of supplying a foothold for the permanent entrance of a higher grade of practical politician.

WHAT THE SETTLEMENT STANDS FOR.

Settlement work stands for reform by identification and cooperation. Under the settlement scheme, opposition must be reduced to the minimum. Settlement policy is essentially a policy of compromise. In educational matters, in the labor problem, in religion, the settlement worker is always the possibilist. His steps are guided by the desire to come into fellowship with the people who happen to be about him, and not by doctrinaire

standards or the abstract passion for perfection. It is also true that a settlement must give every possible hostage to fortune and must enter upon a constructive, statesmanlike policy for the district of which it aims to become more and more an integral and vital part.

From this point of view it must distinctly be said that municipal reform which devotes itself to the correction of the methods of city government must nearly always be futile, because it is not so much the methods as the aims of city government that vitally concern the masses of the citizens. The settlement worker himself, from the very pressure of conditions about him, turns instinctively to the city government with the request not merely that it perform its local service more thoroughly but that it keep widening the range of its local service. In a cander, more individual way, and looking upon the city government as composed of certain individuals, this is precisely the attitude of the people of the district. They take it for granted that the municipality is to be of some sort of use to them. The opportunity of the settlement lies in discerning and bringing to the local consciousness individual needs which are common needs, public needs, and in organizing movements in municipal politics through which such needs shall be met.

At the same time, the natural political following of the settlement is not the inhabitants of the neighborhood in which the settlement is located, but rather public-spirited people throughout the city generally who share the settlement point of view and will act with it in efforts for better and more progressive municipal administration, especially in the interest of the masses of the people. In all our cities there is coming to be an increasing body of independent voters, constituting a balance of power, through which important concessions can be gained from both parties. The settlement having its connections with the general independent vote, as well as, to a degree, with the local vote in its own district, has a special opportunity in the way of suggesting and promoting measures such as will secure the support of both these elements in the electorate.

POLITICIANS' METHODS.

In nearly all cases it is idle for the settlement to attempt to win away the following of local politicians. To make such an

attempt is to leave out of account the loyalties of class, race and religion which bind the people of the crowded wards to their political leaders. The notion that the young university man by living in such a ward a few years and dispensing kindness around, can become political master of the situation, is one that belongs to the story-books. The successful political leader is the man to the local manner born, who enters instinctively into the ambitions and passions of his people, and to whom they return even after he has been untrue to them, as one does to a blood relation. No ready-made attachment can take the place of such a bond as this.

The method of the boss in organizing his local power, however, has two fatal defects. The awarding of his favors has the uncertainty of a game of chance; after election he may not have favors to award. It has in addition a great deal of unfairness and partiality. The strength of the method of the boss lies in the fact that it has to do with supplying tangible benefits to meet keenly felt, unrelenting human needs such as are characteristic of his constituency. He controls some of the best avenues to livelihood; the winning of a job or a license depends on him. A man in need may through him reach the resources of charity. A wrongdoer may through him find immunity from punishment.

WANTED: A PROGRESSIVE POLICY.

There is already sufficient experience to prove that settlement workers may be the means of introducing a new sort of issue into local politics which will to a large extent have the advantage of the boss's method without its weakness. A municipal platform calling for playgrounds, public baths, public gymnasiums, public libraries, popular lectures and concerts in the tenement-house wards is one that proposes tangible and eagerly sought benefits, which are to be dispensed without the precariousness and favoritism of the boss's bestowings, but with the regularity and impartiality of public service. This contrast is one that becomes more and more distinct as such improvements are introduced and as their practical worth comes to be recognized and registered in the prevailing local sentiment.

It is found, moreover, that the boss is compelled, whatever his own inclinations may be, to become a supporter of such a progressive policy. As the policy becomes more firmly established

we may reasonably expect to see a better type of local political leader, a man who endeavors to supply local public needs rather than merely to "fix" a certain number of influential individuals. The mass of the voters under such a policy come to have a new sense as to the meaning of their citizenship, when they find the municipality touching their lives in ways of substantial helpfulness, and as they realize that they are themselves joint owners in such beneficent enterprises. The Dover street bath-house in Boston, at which 300,000 baths were taken during its first year, is, I believe from close observation, quite as important an influence toward civic loyalty as it is toward public health.

Such a policy cannot be introduced, however, without the aid of the independent vote which has already been mentioned. It is the most important office of the settlement in practical city politics to bring about so much of common understanding and united action between public-spirited citizens and local politicians as will make it possible to secure for the tenement-house districts of the city public improvements suited to their particular needs. It has long been seen that the adornment with parks and boulevards of the districts of the city in which well-to-do people live was a matter affecting the general public welfare. It is time now that the intelligent and prosperous classes in our cities should see that it is at least as much to the public interest that some show of justice should be done to the neglected portions of the city through supplying means of health and recreation analogous to those which the uptown districts are so amply favored with.

The object of the settlement, therefore, in political matters is to lift local issues to the level of common, honest, local needs; to instil into the mind of the local voter, by actual experience on his part, a conception of the city as a co-operative enterprise based on mutual aid, instead of either an oligarchy whose favor is to be gained by truculence, or an efficient despotism under some commercial Cincinnatus; not to attempt the destruction of the boss, but to develop out of him a type of local leader who shall, with as much realism as before, stand for a distinctively local kind of public spirit; and to induce larger and larger numbers of progressive citizens, living in different sections of the city, to join with the settlement in taking these perfectly definite steps toward a more realistic type of municipal politics.

THE SALOON IN POLITICS.

By Bolton Hall.

"The cure for the evils of liberty is more liberty," but monopoly is the daughter of restriction. Such is the orthodox "single-tax" view of the saloon problem.

There must be more milk than beer used in the city of New York; yet it is not the milkman but the publican that takes three street corners out of four at a transfer point, fits them up regardless of expense and runs club rooms and a free restaurant in order to sell his drinks. If we ask the milkman why this is so, he will tell you there is not profit enough in milk selling to justify such expenditures; competition cuts down the profits far below such figures. But the profits of the liquor traffic do justify such expenditures. There must, therefore, be some special advantage in that business, something in the business that shields it from the profit-spoiling influence of competition; in fact some monopoly.

This monopoly exists doubtless, in some degree because the business is regarded as discreditable, and this discredit is balanced by larger money returns. But there seems to be no reasonable doubt that the monopoly is mainly due to the way in which the business is taxed at every turn. First, our national internal revenue law taxes the manufacture of alcoholic drinks so as to make their manufacture impossible except to those of large capital. Then the local excise demands such high license fees that practically all the saloons in New York, in Philadelphia and in other cities are under the control of large brewers that are able to advance these fees. It is hard to realize the weight of liquor taxes. When one buys a quart of whiskey for a dollar and a half, he buys something that cost the dealer not over one dollar. Of that dollar, all but thirteen cents is taxes and the profit made upon taxes.

Further, the treatment of manufacturers by the excise inspectors, the granting of licenses and the control of drinking places by

the police are naturally intimately connected with politics.. Even the strict and literal enforcement of the law against one competitor, while the doings of his rivals are winked at, is sufficient to drive him out of the business. When those engaged in any business are so dependent upon the politicians in control of the administration of the law, it is natural that they should band themselves together for mutual defence and strive to secure lenient treatment by making themselves powerful political factors.

This is exactly what has happened, and accordingly we find that the higher the liquor taxes the stronger and the more concentrated the political power of liquor becomes. So that in Philadelphia, for instance, where "highest license" prevails, the liquor interest is a unit and a controlling unit in politics.

All sorts of remedies are proposed for this state of affairs, from anti-treating and teetotal societies down to buttermilk stands: prohibition—with the happy effect of showing that the best way to repeal a bad law is to evade it: high license—a spring of corruption: Raines laws and Gutenberg and Carolina plans in endless variety. It seems unfortunate not to have another elaborate remedy to advance.

If we proposed some Carolina Restrictenberg plan that took four pages to outline, it would be received with respect, for the general belief is that the remedy for the evils of restriction is more restriction. When it was tried, learned professors would make reports as to its effects upon arrests for drunkenness, revenue and pauperism, and upon the asymptote of supply and demand.

But our plan is simply to abolish all restrictions.

The first effect of this would undoubtedly be to increase drinking by certain individuals. This was in fact the effect in Glasgow when it was tried there, and it so horrified the good Scotch people that they repealed their law of liberty. But this was but a lack of faith in the order of nature. Had the "free rum" been allowed to continue, the weak and intemperate would have drunk themselves happily to death; easily and quickly instead of as now slowly and painfully.

On the other hand, by destroying the limited monopoly of the liquor trade, we would vastly reduce the cost, the profit and the selling price of liquor. This would break up the "treating" habit. For who would treat a man to a drink for a cent? It would therefore bankrupt most liquor dealers and reduce the

number and attractiveness of saloons, thus minimizing the temptations to drink.

To abolish all restriction on the sale of liquor would destroy the special privileges of those who get into the business in spite of the restrictions, and would make a liquor party in politics as impossible as a candy ring in the army or a soda water power in the church.

That the liquor power exists is due not to the wickedness of the rum seller, but to the stupidity of his opponents and to the recklessness with which we interfere with "the liberty of each to do what he wills, provided he does not thereby interfere with the similar liberty of others." And this contempt and neglect of human rights is visited upon us in corrupt politics, for, "If we scratch a social problem we find a social wrong."

THE SALOON IN POLITICS.

By Ernest H. Crosby.

It is generally supposed that there is some subtile connection between the trade of selling liquor over the bar and the desire to take part in political life, but I believe that this supposition is entirely erroneous. As far as my acquaintance with liquor dealers and bartenders goes, I have been unable to discover any natural link between the taste for mixing drinks and that for managing primaries. The fact is that the saloon is in politics because politics have overflowed the saloon. The obvious way to take the saloon out of politics is to take politics off the saloon. It is the fear of more legislation that keeps the saloon in politics.

But, it may be said, admitting that the saloon may be removed from politics in this way, will not drunkenness become much more prevalent if we do not legislate against the saloons? I think not. I have traveled in almost every country of Europe, in many of the states in this country, and in parts of Asia and Africa, and I have observed populations whose laws have varied from the strict prohibition law of Maine to the most liberal laws of the Continent, and I have never seen a land where anyone who wanted to drink could not get a drink when he wanted it. In the lands where the laws were most severe intoxication was most common. I have passed two years at a time in Egypt and the Continent without seeing one drunken man, and then in a single week in England or the United States seen half a dozen. One cannot help inferring that laws have no effect on drunkenness whatever. What difference does it make whether there is one saloon on a corner or four saloons, so far as the opportunity to drink is concerned?

Strange to say, on the other hand, laws in restraint of liquor selling make the trade a monopoly and increase its wealth and power. It is our internal revenue tax which gives the brewers a practical monopoly. The increased cost of setting up a brewing

business caused by the revenue tax shuts out a great deal of effective competition. The brewers are unanimous in their support of the internal revenue system, for to it they owe in large part their immense riches. There is no reason why brewers should be richer than editors. Put a similar internal revenue tax on newspapers and all editors would be rich. Now, it so happens that the wealth of the brewers is one of the chief causes of the multiplication of saloons. Almost every saloon has a big brewer behind it; the saloon keeper is a man of straw. The brewer backs him up and takes a chattel-mortgage on his fixtures, because he wishes to push his brand of beer. He does not do it to promote drinking in general, for he knows that men who want to drink will drink without his assistance, but he wants them to consume his beer and not some one else's, and for that reason he wishes to have as many saloons selling his beer as possible. His great wealth, having its origin in the internal revenue law, makes it possible for him to do this. The quickest and surest way to reduce the number of saloons, if that is what you want to do, is to abolish the internal revenue office. Competition would at once cut off the outrageous profits of the brewers and they would not have capital enough to establish saloons at every corner. Such a course would reduce the price of beer, it is true, but it would not increase its consumption, for, as it is, everyone drinks all the beer he wants. It would merely leave more money for the workman to take home to his wife.

It is undoubtedly a fact that state license and tax laws tend to diminish the number of saloons, but in this country this tendency is more than counteracted by the power of the brewing monopoly. The question of the number of saloons seems unimportant. If a part of the energy devoted to reducing the number of them were applied to the purification of the liquor sold, the result would be more gratifying.

No one feels more strongly than I do the horrors of drunkenness,—the crimes, diseases, domestic tragedies and miseries which result from it. I sympathise with the impulse which rises so naturally in the human breast, to treat as out-laws and brutes the men who are willing to carry on such a business as liquor-selling, and yet honesty obliges me to admit that as a class saloon-keepers are the most genial of men and the most helpful and considerate to their neighbors. Saloons have their virtues as well as

their faults. There is a social kindliness in a German beer garden which is sadly wanting in a dairy lunch-room. The question of saloons is not the simple one of good and evil which it is generally thought to be.

We are far too prone, when something goes wrong, to rush to the legislature for a remedy. Legislatures may be very good recording machines, but they are not really of much use as initiators of ideas. When public opinion coincides with a statute, we see a good result, but it should be ascribed chiefly to the public opinion. When public opinion is ranged against the statute, its passage can only be mischievous, no matter how excellent it may be in itself. Its only defect may be that it is ahead of the times, but that defect is enough to damn it. The real remedy for drunkenness lies in public opinion and the public conscience. This is a slow and laborious course of treatment, and it is so much easier to enact the millennium by statute than to make a beginning of living it that we naturally have tried the former way first. The results have been disappointing, and it is high time to ask whether it would not be better to adopt the latter method. Temperance is a noble thing, but so is freedom. For fifty years we have sacrificed freedom to temperance and without enjoying either. Is it not possible that they may get on better together as friends than they have done as enemies?

BOOK REVIEWS.

MUNICIPAL PROBLEMS.

The City for the People. By FRANK PARSONS. Philadelphia, F. C. Taylor, 1900. 12mo, 595 pp. Cloth, $1.

The title of this volume—"The City for the People"—sufficiently suggests, perhaps, the nature of the materials which are herein contained. The divisions of the work and the relative importance assigned by the author to each subject can best be indicated by the titles of the leading chapters and the space alloted to each. In the first and most elaborate chapter, comprising 240 pages, are discussed the various phases of public ownership. Chapter II, Direct Legislation, 140 pages; Chapter III, Home Rule for Cities, 85 pages; Chapter IV, Merit System of Civil Service, 90 pages. The remaining chapters are devoted to the consideration of Proportional Representation, Preferential Voting, Australian Ballot, Corrupt Practices, Legislative Forms, and a full and comprehensive index to the volume. The author has ventured to adopt the reform spelling schedule of the National Educational Association, and makes open avowal of no copyright restrictions, but on the contrary invites the press and those interested to use freely the materials of the volume.

The position of the author is so generally known to the students of municipal problems that a brief summary of the present pages will suffice. As a working proposition it is assumed that the concentration of population and wealth has made monopoly inevitable and that "the problem of the city is the problem of monopoly." This monopolistic tendency, however, is only a danger so long as it is "private monopoly." The problem before the people of our cities is, therefore, to check this undesirable tendency by the "diffusion" of industrial and political power, which is the "ideal of civilization." It is shown that governmental regulation and control have been failures, and that a more adequate remedy must be sought. By a series of substitutions we are to attain this end. In the first place there must be substituted "public monopoly" for "private monopoly" in the field of industrial functions. In the second place it is contended that "public ownership and government ownership are by no means synonomous," since the government of our cities is controlled by private interests, rather than by the people, made possible by the prevailing forms and practices of a centralized administrative and political system. "Public ownership" must therefore be made real by perfecting the machinery of popular government. In order to realize these ends we must secure a larger sphere of home rule for our cities, direct legislation for the people, civil service reform, etc. We must substitute "the public ownership of government" for "the private ownership of government," and in this manner "the public ownership of monopolies" will become real.

These general propositions are treated in great detail both as to facts and argument. The spirit of the volume indicates that Professor Parsons has worked zealously in the cause for which he writes, but the reader should remember that while the author has written avowedly in a scientific spirit, he is obviously a partisan. There is

no serious attempt to discuss both sides of the question of public ownership, but the objections urged against it, are presented for the purpose of refutation, and in a manner which will not strengthen a cause so speciously pleaded elsewhere. A rather intemperate literary style and loose classification often do injustice to the important themes which are here discussed. But these defects are too often found in the popular, propagandic literature in this field. The chapters treating of the mechanism of popular government are better executed.

The reader will find, however, that the most serious criticism of the work is not so much in the ideas and conclusions of the author as in the manner and form of their presentation. In fact, the main propositions will find general favor among readers. Moreover, in this volume will be found an earnest plea for the municipalization of public utilities, a full store-house of facts and opinions in support of that position, as well as a valuable discussion of the methods which are ultimately to protect the people in the real exercise of their political rights.

Madison, Wis. SAMUEL E. SPARLING.

SCHOOL DECORATION.

School Sanitation and Decoration. A Practical Study of Health and Beauty in their Relations to the Public Schools. By SEVERANCE BURRAGE, B.S. and HENRY T. BAILEY. Boston, D. C. Heath & Co., 1900. 8vo, 191 pp. Cloth, $1.50.

Of works on sanitary engineering which deal with special problems in school construction, there are not a few. The same might be said of volumes on medicine treating of school hygiene. School decoration, however, has as a special subject received but scant attention. A few scattered chapters, a monograph or two, and half a score of magazine articles comprise its literature.

The present volume is designed to present in brief and popular form all three subjects—sanitation, hygiene and decoration. In their attempt to secure unity in the treatment of these different topics the authors have encountered their chief difficulty, which lies in the fact that as topics, sanitation and decoration have but little in common. The sanitary problems involved in the erection of school buildings are not for the class teacher who comes to the building only after its completion, while the choice of casts and pictures is a matter in which the sanitary engineer has but small interest. As a result the chapters in the present volume are written at times from widely different points of view. Some have suggestions for the school architect, some are addressed to the school trustee, while others appeal directly to the class teacher.

The chapter on school architecture is written by Mr. Arthur Bohn, a third collaborateur. In it he discusses the construction and requirements of different forms of school buildings, treating in detail some of the problems encountered in the designing of one, two, four and eight room buildings. As an illustration of a modern type of one-room building, he shows the plans and a photograph of a $5,000 school in Porter County, Indiana,—a structure very different from the little red school house of our forbears.

The sanitary problems of ventilation, sewerage disposal and water supply are treated briefly by Mr. Burrage, who also writes upon the subject of school desks and the hygiene of the school-room.

In the chapters on the diseases incidental to school life, emphasis is laid upon the value of medical inspection. The importance of genuine inspection is not to be gainsaid, but the author fails to point to a defect common to most forms of such inspection. The trouble is that it doesn't inspect. The school doctor, as a rule, sees only the cases sent to him. Most of these cases in default of his appearance would be sent home as

"sick," but the dullard, the myope, the "mouth breather" with his pharynx choked with adenoids, he never sees unless he personally examines each child in the school.

The chapters on decoration are by Mr. Bailey. They treat in major part with the walls of the class-room and of the pictures and casts which may be used as decorations. Mention is scarce made of the structural phases of the problem. These are involved in the design of the building itself. Such a chapter, however, might well be written. The materials for its appropriate illustration may even now be gathered in the form of photographs of well planned schools with exteriors tastefully treated and interiors—foyers, halls, stairways and assembly-rooms—so designed as to lend themselves most effectively to enrichment with pictures, casts and frescoes.

For the class teacher Mr. Bailey has many practical and helpful suggestions. Directions are given regarding the choice and framing of pictures and casts, and as an appendix, there appears a list of suitable subjects for the grades, to be had in print and in plaster. A list of the various publishers of pictures and makers of casts might to considerable advantage have been included.

The book is abundantly illustrated, and while scarcely in the language of its title "a study," contains so much of value either in the form of suggestion or direction as to warrant in measure, the hope expressed by its authors that it may "fill the want" felt by teachers and school boards. Indeed, so catholic is its scope that a teacher in a badly ventilated school might without impropriety present it for perusal to a visiting trustee, or a school board officer commend it to the consideration of an instructor whose ideas of decoration were confined to the hanging of a presentation calendar.

New York City. JAMES P. HANEY.

MONOPOLIES.

Monopolies and Trusts. By RICHARD T. ELY, PH.D., LL. D. New York, Macmillan Co., 1900. 12mo, 278 pp. Cloth, $1.25.

This work by Professor Ely deals mainly with the points of difference between industrial monopolies, the so-called trusts, and monopolies dependent upon legal enactment, franchises and situation. The latter group only are entitled to the name of monopoly, and they alone are proper subjects for government control and ownership. Municipal monopolies appear in this group. These are but incidentally touched upon, usually as illustrations of the general principles enunciated. For example, monopoly does not tend to uniform price based on cost, but to "class price" based on different circumstances of purchasers. This accounts for two prices for gas out of the same pipes, one for illuminating, the other for fuel. By playing upon classes of consumers in this way, the monopoly receives the greatest net returns. "How different from a competitive price!" says Professor Ely. "If our grocer should, when selling us flour, ask if we intended to use it for cake or bread, in order to charge a higher price for the cake-use than the bread-use, we would regard it as a piece of impertinence on his part, and would not at all submit to his efforts to introduce class price."

Professor Ely believes that in every great American city a three-cent car fare, increasing the traffic very largely, would yield ample returns upon all the capital actually invested.

As a discussion of the monopoly question in general this book takes the highest rank.

New York City. JOHN R. COMMONS.

BERLIN.

Die Stadt Berlin, Festschrift der Stadtgemeinde für die Teilnehmer am VII. Internationalen Geographen-Kongress. Berlin, 1899. Published for the city by Dietrich Reimer (Ernst Vohsen.) 12mo, 871 pp.

The fondness of our Teutonic cousins for ceremony and celebration in connection with any event of public or festal importance is one of their most amiable foibles, if indeed, it is to be counted as such at all. When it takes the form of so clever a *Festschrift* as the one issued by the city of Berlin on the occasion of the International Geographical Congress held there last year, it certainly deserves our thorough admiration. Although the *Festschrift* was designed to minister primarily to the needs of the natural scientists from all parts of the world who were in attendance on the Congress, it still presents much of interest to the student of city government. Thus besides essays on the climatic, physical and geographical features of Berlin and on its various scientific institutions, the volume contains interesting sketches of the history and administration of the city by Dr. Albrecht and Dr. F. Kremski (pp. 41,49). The latter is officially connected with the city government as *Magistrat-Assessor*, and writes with the thorough command of his subject which practical experience and careful observation alone can give. The clearness and readable quality of his exposition of the framework of the city government of Berlin would be more than sufficient to win the positive approval of his readers if he had written in any other language; in German they are virtues rare enough to deserve praise couched in nothing less than superlatives. The brief but graphic account of the city finances which he adds is by no means the least interesting part of his sketch.

Herr Busemann's statistical study of the population of Berlin (p. 89) also deserves mention among the articles of interest to students of city government.

The artistic makeup of the Berlin *Festschrift* reflects great credit upon those who designed it. It is illustrated by numerous exceedingly beautiful heliogravures which serve well to show how far Berlin has progressed towards the fulfillment of the ambition expressed by the present Kaiser in the words: "*Berlin wird noch einmal die schönste Stadt der Welt*" (p. 88).

Cornell University. ROBERT C. BROOKS.

NOTES AND DIGESTS.

MARCH—JUNE, 1900.

HAS MUNICIPALIZATION FAILED?

In a recent issue of the *Independent*, Mr. H. H. Vreeland, President of the Metropolitan Street Railway of New York, in an article entitled, "The Failure of Municipal Ownership," attempts to prove that municipal ownership of public utilities in Great Britain is a failure. He compares European with American conditions and concludes that the superiority of American street railways, particularly those of New York city, is due to the fact that in foreign cities the municipalities own and operate street railways, and in American cities, private companies have almost supreme control. He compares, for example, Glasgow with New York, and claims that considering the distance fares are lower, the service better and wages higher in New York. This conclusion is undoubtedly true, but the inference he draws from these facts, namely, that the difference is due to municipalization, is unfounded. In almost every line of industrial and commercial activity, the American is far ahead of the Englishman, and the difference is no greater in the case of street railways than in the case of steam railways, bridge building and other lines of industrial activity where the rapid introduction of inventions influence business methods.

Further, if Mr. Vreeland should compare *municipal* street railways with *private* street railways in Great Britain, he would find that the former are far superior to the latter, and that wherever street railways have been municipalized, the fares have been lowered, the service improved, wages increased and a larger sum of money received by city authorities for public purposes. Whether the same policy applied to American cities would lead to similar results, is a different question, but the opponents to municipalization are far from the truth and are pursuing an unwise policy when they attempt to discredit municipalization in Great Britain by disregarding easily ascertainable facts.

In his attempt to demonstrate the superiority of private ownership, Mr. Vreeland overreaches himself. He states:

"A large part of the American trackage does not pay, and may not for years to come, but meanwhile it furnishes public accommodation.

"That most of it now pays exceedingly well is due to the boldness and enterprise of the men who put in the money and the work necessary to build up the properties. The stock of some of the horse car lines of New York city was given away in payment for hay, oats and bedding at twenty-five per cent of its face value, and was accepted at that rate only for the reason that there was nothing else with which to pay. The heated advocates of municipal ownership are ignorant of facts like these, and insist on discussing the original grant from the point of present value.

"Franchises were given away at a time when they had no selling value—when a

company operating a railroad must expect to lose money for years till it could build up a population that would support it."

It is a highly mistaken notion that franchises were granted when they possessed no market value, and that their present value is due to the boldness and enterprise of the men who put in the money and built up the system. A careful survey of the history of public franchise grants in any large city will show its fallacy. In four out of five cases franchises that were originally given away as far as the public is concerned, could have been sold for thousands of dollars at public auction, and in many instances the franchises *were* sold for a considerable sum, but instead of this money going into the treasury of the city, it went into the pockets of corrupt officials. If any one doubts this statement, he need only read the monograph by Mr. Myers, "The History of Public Franchises in New York City," in the last number of MUNICIPAL AFFAIRS.

It is undoubtedly true that the present value of franchises is due, to a certain extent, to the enterprise of the companies, but it is to be remembered that, in a great measure, these franchises have increased in value owing to the increasing density of population, and not alone to the ability of the corporation.

Mr. Vreeland also states that, "Now franchises in New York are all sold, none can be legally given away; regulations are prescribed by statute, under which they are sold in open market, after long notice, to any one who offers the highest price for them. This price is so fixed that it varies with the growth of the gross receipts earned from the franchise granted."

This is true, but one must bear in mind that the few railway franchises yet to be granted in New York city for example, are worth far more to the Metropolitan Street Railway than they are to any other company, owing to the fact that a new company, having no other system, could not operate them as cheaply, nor give as valuable service, owing to the lack of transfers upon other lines, as could the Metropolitan company. And further, this is not due to the superior management and ability of the Metropolitan company, but simply to the fact that they own all of the lines at present, and thereby put an independent company at a decided disadvantage. The experience under this system of granting franchises shows further that Mr. Vreeland's previous statement that franchises when granted had no value, is entirely wrong, for since the plan has been adopted not one has been given away, and in a few instances the receipts have been as high as thirty or forty per cent of the gross receipts.

INSURANCE FOR THE UNEMPLOYED.

After several years of careful consideration and scientific research, the City of Basel, Switzerland, has adopted a scheme of insurance for the unemployed. The essential features, which we quote from the May number of the *Yale Review*, are as follows:

"From the first the insurance has been compulsory, not optional, for the classes of workers subject to it. These do not include all wage-workers, but only those in the trades subject to the factory law of 1877, and those engaged in the building trades and in earth works, provided that they reside in Basel, are over 14 years of age, and earn less than a certain amount. This was at first fixed at 2,000 francs a year, but was afterward lowered to 1,800. According to Professor Schanz, less than one-half of those who are liable to be out of work will get anything from the insurance, since many occupations are not included at all, while those who live outside of the canton are not subject to it, and of those who are included a very considerable number live and work there for but a part of the year. These will have to pay contributions while they work, since no one can tell in advance how long they will be in the canton; but if they happen to leave

before they have had time to pay dues for half a year, they lose all claim to benefit. The funds are supplied from four sources: the dues of the insured, the dues of the employers, the subsidy of the state, and private benevolence. The state also bears the expenses of management, and in case of deficit is to advance the necessary sums, without being financially responsible for making them good. The dues of the insured are collected through the employer, who must deduct them from the wages. The relief consists in a weekly pension, whose amount varies with the size of the family and the wage class to which the insured belongs, and is limited to a certain number of days in the fiscal year."

"The law divides the insured into four groups according to the risk of unemployment and into four classes according to the wages they receive."

"The weekly contributions due from the insured may be summarized as follows:

Wage Class.	1 (1 to 12 frs.)	2 (12–18 frs.)	3 (18–24 frs.)	4 (over 24 frs.)
Group 1	2½ cts.	5 cts.	10 cts.	15 cts.
" 2	5	10	15	20
" 3	10	20	30	40
" 4	15	25	40	50

The weekly allowance to which the insured are entitled varies according to the supposed needs of the individual, and is, therefore, graded according to the size of the family. To avoid needless detail, it will suffice to state that three such family groups are recognized, the type of group A being the single man without dependents; of group B, the man with a wife and one child, or the widower with children under fourteen; of group C, the man with a wife and more than one child under fourteen. The following table shows the weekly allowance in detail:

Wage Class.	1	2	3	4
Family Group A.	70 cts.	80 cts.	90 cts.	1.00 fr.
" " B.	1 fr.	1.20 fr.	1.40 fr.	1.50 "
" " C.	1.30 fr.	1.50 "	1.70 "	2.00 "

"No one is allowed to receive help for more than seventy days (in the first draft ninety-one days) in one fiscal year, and it goes without saying that in general the loss of work must be involuntary, and not caused by some fault of the worker. To specify what circumstances shall, in a concrete case, cause the forfeiture of the allowance is not so easy, and several changes have been made since the first draft. The reasons which deprive the insured of the right to an allowance are enumerated as follows in the law as passed:

(a) If the unemployment is the result of strike, as long as the strike lasts.

(b) If it is the result of voluntary withdrawal, except when a reason exists which justified an immediate withdrawal;

(c) If the unemployment is the result of behavior on the part of the insured which would, according to law, have justified his immediate dismissal;

(d) If the unemployment is the result of sickness or accident, as long as they last;

(e) If the insured has not fulfilled the conditions of section 4 and 88 (providing in substance that he must have kept up his membership for a year or, in the case of one who has resided a year previously in the canton, for six months.)

(f) If the insured refuses without weighty reasons an opportunity for work."

"According to this estimate, the insured are expected to contribute but a little over one-half of the amount actually spent on benefits, and about thirty-nine per cent of the annual receipts."

"The tendency in all such legislation is to grow more and more liberal towards the laboring man, and this tendency has marked most of the changes made in the original bill. The dues of the beneficiaries of the law are a much larger fraction of the

total than in Bern, but it is clear that the ordinary principles of insurance do not apply to this kind of legislation, and that, as long as a subsidy is necessary to balance the accounts, there are neither mathematical nor economic reasons for making the amount borne by the insured one-third rather than one-seventh. The amount must depend entirely upon the readiness of the voters to lay taxes."

SHOULD MUNICIPAL THEATERS BE ESTABLISHED?

In the May number of the *American Journal of Sociology*, Professor James H. Hamilton contributes, "A Neglected Principle in Civic Reform," in which he puts forth the thesis that "the fundamental errors of the municipal radicals seem to consist in a too material conception of the municipality and a failure to appreciate the capacity of the people to respond to æsthetic appeals." In his opinion the reason why municipal spirit is so weak in American cities is that they were commercial corporations in origin and still neglect to provide as they should for the social activities of the people. The first task of the reformer is therefore to find a tonic for the low vitality which exists, a quickening influence to arouse this sluggishness. Professor Hamilton suggests that a municipal theater would produce the best results along this line.

"The institution which is most universal and irresistible in its fascinations is the stage. It has been so among all cultured people and in all ages, and most of all when art in general has been at its greatest height and loyalty to the city has been most intense. This is the only phase of art which meets with universal acceptance, for the reason that it delights the senses before it engages the thought. Even high dramatic art is universally pleasurable. Artistic stage setting and costuming, graceful movements, and pleasing elocution, blending with the harmonies of the orchestral music, may be as purely sensual in their appeals as a shaded brook on a summer day. This combination of effects will compel the enjoyment of all sorts and conditions of men. A purified and elevated municipal theater and opera would serve two great ends—they would educate the people, and impress the consciousness of civicism.

"As a culture influence the stage presents great possibilities. High art here will attract all classes. With many the discriminating capacity will at first be absent; only the capacity to respond to sensual appeals will be present; but under wholesome circumstances the growth of the spiritual and intellectual out of the sensual is inevitable. The discriminating sense comes with familiarity with the best, and then the low and vulgar in acting becomes hateful and repellent."

"The ethical force might be made very great. The play is well calculated to appeal to the higher emotions. It has often been observed that nobility of character in the play is always applauded, while the craven and cunning character is hissed. The audience instinctively loves the hero and hates the villain. It has been said that an assemblage of people represents a composite of nobility and high-mindedness in excess of the highest type of individual nobility and high mindedness present. It is owing to this fact that in a religious meeting the most consecrated and devoted Christian always feels the contact with higher virtues than his own. In the same way a meeting for any improving purpose tends to elevate and purify every character present. Habitual appeals to the nobler impulses through the drama—the universally attractive institution—will greatly tend to make virtue lovely and vice hateful."

"The municipal play-house would need to offer a scale of popular prices which would make fair seats accessible to all. In addition to this the generous promenade space of the continental theaters—a place for the intermingling of all the people during the long intermission—should be provided. This relaxing expedient affords opportun-

ity for social contact, a basis for the growth of the community spirit under the very roof of the most delight-giving of the community's properties."

Prof. Hamilton's explanation of the comparatively low development of the social spirit in American cities is quite ingenious. He errs however in assuming that municipal reformers generally take a utilitarian view of city problems at the present time. A study of the campaign literature of the Citizens' Union and other similar organizations would hardly bear out so sweeping a contention. The efforts that are being made in the way of parks, play-grounds, zoological and botanial gardens, recreation piers, open air concerts, art galleries, libraries, etc., are too important and beneficent to be minimized in the interests of so amiable but remote a scheme as that for the erection of municipal theaters. Certainly the exceedingly enterprising gentlemen who are running American cities at the present time would hardly agree with Prof. Hamilton in his belief that municipal reformers were as a class utilitarian. They are far more apt to be found wanting in practical political sense, organizing genius and the ability to forget their conviction that they represent a higher culture, intellectual, ethical and æsthetic, than the masses they address. There is more rose-water than utilitarianism in reform.

LABOR CONDITIONS ON THE PARIS SUBWAY.

In the *American Journal of Sociology* for May, Professor Edmund J. James summarizes the conditions under which laborers are to be employed by the private company which is to operate the new Paris subway. The city is constructing the subway itself, and when completed will lease it to an operating company at a rental of about one-third of the gross income. The agreement provides:

"1. The salaries or wages of the workmen and employees shall be paid fort nightly, and shall in no case be less than 150 francs per month. Men employed temporarily shall receive wages which shall not be lower than 5 francs per day. [Stricken out.]

"2. The working day shall not exceed ten hours. One full day of rest or two full half days shall be granted each week to the personnel. [Stricken out.]

"3. An annual vacation of ten days, with full salary, shall be granted to all employees.

"4. The full salary shall be paid during the periods of military instruction.

"5. Days of sickness, properly certified by the physician appointed by the managers of the fund established in accordance with Article XIX below, shall be paid for in full, without deduction, during the period of at least one year.

"6. In case of accident happening during work and resulting in a temporary incapacity, the workmen shall receive their entire wages until complete recovery, without prejudice to the indemnity which shall be due to them in case of final disability, either total or partial.

"7. The workmen employed in the enterprise shall be insured against accident at the sole cost of the leasing company, which shall not under this head make any deductions from the wages due. Moreover, whatever may be determined in regard to the responsibility for an accident, the leasing company shall always be directly responsible to the victim for the payment of indemnity.

"A physician appointed by the management of the special fund, established in accordance with Article XIX below, shall be summoned to report upon each accident, and it shall be his duty to state the nature and the results of the same.

"8. The administration of the city shall always have the right to prescribe such measures of safety and health as may be considered necessary.

"9. A written commission shall be delivered, under the form of a wage contract, to every adult employee or workman of either sex, who may have completed twenty-four months of service.

"The leasing company is required to observe strictly the conditions above enumerated, in regard to the labor of its employees, under penalty of forfeiture of the lease.

"Article XIX. The leasing company binds itself further:

"(a) To furnish to the working personnel in its employ deposit books of the National Pension Fund. The payments shall be made by means of a two per cent deduction from the wages of the employees and a four per cent contribution by the company, making six per cent, which shall be deposited in their name by the leasing company, on the conditions defined below.

"However, whenever the number of passengers shall exceed 220,000,000, the deduction from the wages of the laborers shall be reduced to one per cent, and the contribution by the company increased to six per cent, thus making the payment to be made in their name by the leasing company seven per cent.

"(b) To establish a free medical and drug service.

"(c) To insure its laborers and employees against accident.

"To insure the execution of paragraph (b) of the present article, as well as paragraphs 5, 6 and 7 of the preceding article, the leasing company shall organize a special fund, which shall be managed by the workmen and employees themselves.

"The leasing company shall charge to general expenses a sum sufficient to make the payments stipulated in (a), (b) and (c).

"It is an interesting fact that the introduction of these provisions into the lease did not give rise to any prolonged negotiations between the parties concerned, nor did it excite any considerable discussion either in the city council or the Parliament. In fact, the leasing company agreed readily to all the conditions, and indeed proposed itself some of the clauses favorable to the laborers."

"The government upon the demand of the minister of public works and upon the advice of the council of state, has struck out the two provisions of the lease relating to the minimum wage and the normal working day, on the ground that they referred to matters already regulated by provisions in the existing code, and that these provisions should be altered only by general law and not by special contract."

RAPID TRANSIT IN NEW YORK.

Probably no municipal undertaking has lately attracted so much attention as the subway which is to be built and put into operation in New York city within the next three years. Mr. William Barclay Parsons, Chief Engineer to the Commission, interestingly describes in the May number of *Scribner's Magazine* how the subway will be constructed and what effect it will have upon traffic.

Nearly ten years ago the subject was first officially recognized by the creation of a Rapid Transit Commission. After passing through various experiences, the present system was decided upon. "The route followed begins with a loop around the Post Office, thence with four tracks direct to the Grand Central Station, westerly from there to Broadway and along that thoroughfare to 104th Street, a distance of seven miles, whence one double-track line continues along Broadway to Kingsbridge, and another double-track line easterly under the Harlem River crossing the Borough of Bronx to Bronx Park and the Zoological Gardens; each of these branches being seven miles long, or a total length, for the whole system, of twenty-one miles. The upper ends of the double-track lines are to be elevated structures for a combined distance of 5.14 miles, as will be

a short length of high steel viaduct half a mile long crossing Manhattan Valley, an abrupt depression on the West Side, while all the remainder will be underground."

"Under the authority of the act empowering the Commission to determine details, the contract was arranged to cover a period of fifty years of operation, with an option of renewal on the part of the contractor for a further period of twenty-five years, at a rental to be decided upon by adjustment or by arbitration at the end of the first period."

"The structure will be close to the surface, with a distance (according to the plans in question, of less than fourteen feet) from the street level to the platform of but little more than one-half the distance from street level to the average elevated railway platform, or about the same as that from one floor to another in an ordinary dwelling. By thus bringing the platform level close to that of the street, it will be possible to secure a vastly greater proportion of short-distance travel than could be the case with a deep tunnel, access to which would have to be by elevators. By roofing over such portions of the stations as lie beneath the sidewalks with glass, it will be possible to illuminate the stations not only with daylight, but with sunlight, and use artificial means only as evening approaches, and so destroy the popular antipathy to a 'hole in the ground.'"

"There will be for the first seven miles four tracks, on the center pair of which there can be run, at all hours of the day, in both directions, trains stopping at about one mile and a half apart, and making, under conditions of actual service, a speed of at least thirty miles an hour. On the outer pair of tracks stations will be at much closer intervals, averaging four to the mile, and where trains can attain a speed of about fourteen miles per hour. A journey the whole length of the seven miles would take by the local trains about thirty minutes and by the express trains about fourteen minutes, a saving of more than fifty per cent."

"In the operation of the railway the contract and specifications forbid the use of any form of motive power requiring or producing combustion within the tunnel, and under such limitation the choice of power and method of application is left entirely to the operator."

"The striking feature of the design is the entire elimination of grade crossings at junctions, and of all switching at the terminal points, permitting the cutting down of the time interval between trains, and so increasing the carrying capacity."

"The effect on the people individually it is feared, so far as the residents of New York are concerned, will be not so permanently beneficial. For years there has been a cry for more transportation facilities to give relief to the crowds that are now obliged to stand during the busy hours in our surface and elevated cars. This relief the proposed underground railroad will give but temporarily. For New York there is no such thing as a solution of the Rapid Transit problem; the city is very much like the victim of the opium habit, who needs more of the drug the more he gets. During the past few years every north and south outlet has been utilized for some form of surface or elevated transportation, or has had its facilities improved to the very utmost, and yet such improvements, radical as they have been, have not been sufficient to meet the growing demand for more. By the time this railway is completed, the normal city growth will, in itself, be enough to provide a lucrative business without decreasing at all the burdens on existing lines."

"As to other transportation lines, if the past is to be any criterion of the future, the effect of the constructing of the underground railway will be advantageous. Whenever a new line has been built in New York, although the first effect may have been—but not always—to draw traffic from a parallel and near-by road, such withdrawal has been but temporary; and in a short time the natural growth of the city, stimulated by

the new means of transportation offered, has been sufficient to provide requisite traffic for the new line and increased traffic for the old ones."

WOMEN AS RENT COLLECTORS.

ONE METHOD OF SOLVING THE HOUSING PROBLEM.

The April issue of the *Economic Review* contains a most interesting account by Alice Lewis, of her experience as landlord and rent collector. The statement is made that the most difficult class to house is the lowest-paid class, or rather that portion of it which is inclined to be disorderly, thriftless or criminal. The experience of Miss Lewis in her attempts to improve this class is most interesting, suggestive and worthy of imitation.

"Now, in order to explain exactly how this transformation is accomplished, I had better give my own experience. Eighteen months ago I went to see an affable solicitor, who, I had heard, was the owner of some very disorderly blocks in the city. I told him that some tenants of mine in an adjoining block could get no rest at night because of the brawling and quarreling that continually took place in his block, and that the conduct on the roof of boys and rough girls among the thieving gang was a great scandal. He was quite polite, and said he would inquire into these things; but he also informed me that he never went near the place himself, that his clerk got the rents from the caretaker, that he was satisfied with the rent he got, and with what he knew of the place, and so on. However, though he promised to see if what I complained of could be remedied, nothing was done. Shortly afterwards these blocks were bought by a good company, and I was put in charge. Then, when several thefts and assaults occurred, I went to the police-station and caused great amusement by my complaints and an appeal for more police supervision. 'The place had been like that for eleven years,' I was told. 'It would never be any better. There had always been a gang of roughs, and when one gang was dispersed another formed. There was not one honest man or woman in the whole block; they were either thieves or re-sellers of stolen goods. The police could not interfere with the gambling on the stairs, nor with bad characters sleeping on the stairs, etc.'"

"The dirt of the courts, stairs, roofs and rooms was indescribable. Few of the gas lamps would light; and to get the tenants to clean their doorways and stairs cost many a weary hour."

"Scolding, threatening, coaxing, sending away after trial the perfectly lawless; lighting up, shutting up back ways, whitewashing, cleaning, curing smoky chimneys, putting in good fire places, putting on bright papers, painting the outside; insisting on getting into every house every week, never ignoring an unwashed doorstep, or a child's dirty face, or a badly kept room, or an unpaid rent; talking incessantly, and making the people feel that talking would lead to action unless there was improvement; and behind all this the despotic power of the landlord—this persistent policy has in a year turned this block into a cheerful, orderly building, where little children can grow up unharmed by evil sights and sounds. The improvement generally comes quite suddenly, often just when we are beginning to despair. The old bad name seems to peel off the place never to return; the struggling respectable poor in the neighborhood find us out and wait for our empty room; the old tenant begins to realize that it is a privilege to live in the old place now so changed; flowers and ferns appear on the window-sills, and clean curtains go up at the windows; and when a pleasant looking woman meets us on the stairs, saying, 'Whenever I have to go out for the children's dinner, you will find my door open and the rent lying on the table,' then we feel that we are again among a people who dwell securely."

"Once we have established our rule we have very little trouble. The tenants rely upon its justice, and they never resent its authority as they would that of an outsider, even a district-visitor. Going for a reference the other day, the door at which I knocked was only opened about an inch. But when I told the woman what I had come about, open went the door. 'I am sure, ma'am, I beg your pardon, ma'am, I thought you were the district lady.' Again, I went to see a woman in Hoxton Market, who was a would-be tenant for some empty rooms I had. I asked a great many questions, getting no answer. At last I said, 'Well, as you will not tell me anything either about yourself or your husband, I am afraid I shall not be able to let you have the rooms.' 'Well,' said the woman, 'didn't I think you did wish to know a lot for a Church lady?' and out streamed all the information I required."

"On one estate that I have managed for years, whenever there is a case of real distress, the people of their own accord get up some sort of fund for its relief, always coming to me first for consultation and approval. They always speak proudly of what they have done, feeling sure of sympathy. Also, after some years of such management, there grows up a tacit understanding among the tenants as to what sort of tenant and what sort of conduct is to be tolerated or not tolerated. Public opinion is formed, and we are told on our weekly visit that such and such things have been decided, and that they will not allow such 'goings-on' in this building or estate. In this way the place becomes self-governing, and the manager only appears to be carrying out the wishes of the tenants."

"One other aspect of the subject remains to be mentioned. The lives of these London people are not dull. They thrill (if I may use the expression) with low tragedy; excitement runs through all their days—accidents, sickness, death, a husband or friend falling out of work, and similar incidents are perennial sources of emotion and interest. They live within touch of hundreds of others—in the factory, the cheap train, and the crowded block—and the daily tragedy soon becomes common property. Many of us try to counteract this rather unwholesome excitement by endeavoring to introduce more refined and elevating pleasures, such as window gardening, days in the country, libraries, and recreation clubs. And in doing so, it is emphatically true that it is our special work as landlords which gives us the esteem and affection of our people."

"One reason why this relationship of landlord and tenant is peculiarly pleasant is because the benefits conferred by the landlord impose no sense of obligation upon the tenant. We may give our tenants many material comforts which they receive as a right, and properly so, while returning an equivalent in the form of rent and good conduct. It is always difficult to give and to receive generously, and consequently the relationship between the poor and the rich is often spoiled; but landlord and tenant can give and receive equally, and their relationship becomes one of mutual respect and friendliness."

"In conclusion, I should point out again that the control of these slums is acquired by purchase, and there are many hundreds of them in the market now. Some years ago a lady, experienced in house management, began buying this kind of property and also persuaded some of her friends to buy, and since then the process of reclamation has continually increased in extent and effectiveness. It is certainly one of the most hopeful ways in which we may help to recreate the homes of the poor, and I need not say that all of us who are engaged in the work would be glad to train new comers in all the practical work of the profession, and to help others to purchase house property by giving all the information we possess. It is a peculiarly sound and secure investment. Those who buy judiciously will have plenty of money to make their houses comfortable homes for the people who rent them, and even to give bonuses and pleasure parties

to their tenants; and, besides all this, they should obtain as good a return on their capital as can be got elsewhere. There is also, of course, great need of more earnest and active workers—capable, energetic young women, willing to throw themselves into this work and anxious to love and serve the poor households of our country. We must all feel what a dark blot it is on our reputation as English women to have these hideous homes in our great metropolis. At any rate, let us do something to decrease the evil."

CITY CHARTERS.

The June number of the *North American Review* contains an article by Comptroller Bird S. Coler on what is becoming a more and more important problem in municipal government, "Charter Needs of Great Cities." The feeling is very general that the present system of specifying in detail the organization of the city governments and the powers of municipal officials is radically wrong. It inevitably leads to legislative interference and the government of cities from the state capitol instead of from the cities themselves. This idea is emphasized by Comptroller Coler, and he urges with great stress that city charters need above all things "brevity and simplicity."

"Without hesitation or fear of contradiction, I class brevity and simplicity as the chief essentials of good charters for our greater cities. Too many laws and too little public and political honesty are directly responsible for most of the bad government that has damaged and disgraced American cities. The charter, or permit from a State government to the people of urban communities to form themselves into a corporation to take, hold, develop and operate public utilities and conduct the public business for the benefit of all citizens, should be so carefully drawn that no essential section would be susceptible of conflicting interpretations; and every right and power conveyed by the act should be stated so clearly that doubt or misunderstanding as to local authority would be impossible. Brevity and simplicity should be the rule in every section, but the duties, powers and responsibilities of all officers should be clearly defined."

Comptroller Coler then proceeds to make a few suggestions which should be embodied in city charters, and advocates that the bonds for revenue producing undertakings, such as water works, gas and electric lighting plants, street railways, docks, markets, etc., should not be included in the constitutional limitations upon the borrowing capacity of cities.

"Under this system the public property, no matter how valuable, is not available as an asset, nor is it negotiable as security for a loan. The property owned by the city of New York is worth, roughly estimated, $500,000,000; yet, under constitutional and charter provisions, the municipality cannot borrow a cent upon this security, the limit of indebtedness being fixed at ten per cent of the assessed value of taxable real estate. The city cannot tax its own property, and it is therefore forced into the unbusinesslike and apparently contradictory position of growing richer and poorer at the same time. Every time the municipality acquires real estate for any purpose, its borrowing capacity is reduced by an amount equal to ten per cent of the assessed value of the land acquired, its income from taxation is reduced, and the property, no matter how valuable it may be, at once becomes worthless as an available asset. No private business could long exist under such a system of restriction."

UNIFORM ACCOUNTING FOR CORPORATIONS.

The extent and strength of public sentiment favoring municipal control of public service corporations is coming to be realized by the corporations themselves. Mr. James Blake Cahoon recently delivered an address before the National Electric Light Association at Chicago, which is printed in the June number of *Municipal Engineering*.

What he has to say is extremely interesting, as it comes from one who is naturally in sympathy with private ownership, but who grasps more fully the real trend of the movement for municipalization than almost any other person similarly situated.

"I doubt if there are in this whole association a dozen members who realize fully the gravity of the present situation for the private ownership of public utilities. The question is taking on a new form. Heretofore, franchises have been granted haphazard, and little if any effort has been made by the different states to follow out any one line of policy with regard to either the granting of franchises or the operation of companies under those franchises. Massachusetts has taken a step, and a long one, in the direction of what the future will bring about, and that is, the regulation of all public utilities, and the compelling of all such corporations, be they private or municipal, to render to a board of commissioners an account in prescribed form at definite intervals.

"We cannot take the stand that it is against public policy that this should be done; it would simply be a case of kicking against the pricks. There lie open before us two paths: Municipal ownership or private ownership under state regulation. We certainly do not want municipal ownership, therefore let us prepare to accede gracefully to the other course; and not only that, but let us help it along. In that lies our salvation. To do that we must be prepared when the question of state regulation is raised to meet the committee half way, to say to them, Here is our system of accounting. It is one in which we believe the true costs to be stated; all the factors that enter into the cost are here. We are not a single company using this system; we are one of a great body, all of whom follow the same method and use the same system of accounts in determining their cost of production. We are perfectly willing to hand in once a year a complete statement of everything, costs as well as receipts, and show you gentlemen, and, through you gentlemen, the great public that is behind you, just what legitimate profit there is in this business. It is not great, and we are willing to have you know what it is and how it is computed. We believe that the introduction of electric lights and gas into a city is a public improvement in the strictest sense of the term. We think the public will sustain us in having a fair return for our labor, our venture and our capital. We are not only willing that the public should know our profit, but we feel that on a somewhat venturesome risk; we believe that if the public does know them it will concede that we are in the right position, and instead of taking away our franchises, letting competition in on us from all sides and trying to squeeze us to the wall in every way, it will realize that we are what we claim to be, a public improvement, and that we deserve fair treatment and we shall get it."

"From a financial point of view it matters little to this association what system of accounting its individual members may follow. If they are deceiving themselves in regard to costs, we as an association should not be warranted in interfering. We, at most, can only recommend the adoption of any system of accounting; we cannot compel our individual members to accept it, but we can at least ask them to do so."

"The necessity, therefore, for a system of uniform accounting lies primarily in the fact that we must unite for self defense, and we must be able to ascertain the true cost of our productions, and at the same time show to the advocates of municipal ownership that, to get the true costs, they must follow our system. In unity only shall we have strength to resist the attack that is coming upon us."

"The number of agitators that are crying municipal ownership of public utilities is constantly and rapidly increasing; they are attacking us in all parts of the country even now, and the attack will be stronger and stronger as time goes on. Our plan of defense must lie in the correct determination of costs, and in showing that while we are exercising the functions of a monopoly, we are only attempting to realize therefrom a

legitimate profit for the capital we have invested in the enterprise. To do this we must have uniformity of accounting, in order that we may present a solid front and be able to disarm the agitators by showing to the people at large that we are following fair business methods and only obtaining a fair return on our investments. If we are able then, to convince the people of this, they in turn will support us in our rights, will see that we are given the privilege of exercising the functions of a monopoly under proper laws, and will realize the necessity for granting us exclusive franchises, in order that the best economy of operation may be effected, and the people furnished with light and power at a minimum cost."

An equally strong argument may be made in favor of uniform accounting from the point of view of the disinterested person who is anxious to ascertain definite results concerning the comparitive success of municipal and private management. As yet, many feel, and justly too, that it is almost impossible to arrive at any definite conclusions as to American conditions, owing to the diversity of systems adopted both by corporations and municipalities, and the imperfect application in many instances of the system which they try to follow.

Mr. Cahoon devotes the main portion of his article to a consideration in detail of the forms of accounting and the facts to be brought out. One may safely predict that the subject will receive more and more attention, and Mr. Cahoon's article is well worthy of careful consideration.

STREET RAILWAYS IN BERLIN.

Many years ago Berlin granted extensive franchises to private corporations, which expire about the year 1905. This date being so near at hand, the companies refused to replace horse traction by electricity, unless their franchises were extended and favorable terms granted them. Upon the other hand, the city wished to take over the franchises in 1905; but the people were not content to wait until that late date for the introduction of electricity. As a result, a contract was made with the two most important corporations in 1898. The terms of this contract are given in the May number of the *Annals of the American Academy of Political and Social Science* by Professor Edmund J. James, and are very interesting, as they show how extremely favorable terms can be secured if the municipality insists.

"The companies agreed to convert all their horse car lines into railroads with electric traction, and to apply the same to all new lines opened by them during the term of their concession. This conversion of horse traction into electric traction is to be complete within five full years after the signing of the contracts. The general system of traction is that known as the trolley system, but in its place a mixed system of storage battery and trolley may be introduced at any time, upon demand of the city authorities. The electricity is to be obtained from such places as are indicated by the city authorities. The city may insist upon the construction of additional lines whenever the public interest may demand it, and in such places as it may determine, to the amount of 150 kilometres, and the tracks of these companies may be used by other companies chartered by the city for the distance of 400 metres. The companies bound themselves to erect waiting rooms at the ends of their lines, and at the various stopping places, which shall be warmed and lighted, these stations to be erected upon demand of the city. Motormen and conductors are not to be employed for more than ten hours per day. Three years after the conclusion of this contract the companies shall reduce their price of transportation for a single, unbroken trip, along the whole length of their lines, both within and without the city limits, to a uniform price of 10 pfennigs (2.38c).

The companies shall provide a pension system for their employees. They shall pay to the city for the use of city property eight per cent of their gross income from transportation of persons and goods, and whenever the net return of the enterprise shall exceed twelve per cent of the present capital stock or six per cent upon any additional capital employed in extending the lines, the half of the excess profit shall be paid into the city treasury. The contracts shall run to the thirty-first of December, 1919. At the end of the contract the lines and rolling stock of the companies shall pass into the possession of the city of Berlin, without any remuneration whatever."

These terms show the contract to be very liberal to the city, but the action has been severely criticised, and the authorities are now at work drawing up plans for a municipal system in addition to the lines that already exist. This is especially important, as until recently street railways have generally been considered by German cities as outside the proper sphere of municipal activity. Municipal operation is very common in Great Britain, but only a few Continental cities, e. g. Basel, Barmen, Prague, St. Petersburg, Bern and Cologne, have municipalized their tramways. Even German cities which have undertaken so many functions commonly considered socialistic have not gone far in this direction. If Berlin's example be followed, as is highly probable, their experience will be observed with great interest.

TREES AND PARKS IN CITIES.

In the *Forum* for May, 1900, Mr. Louis Windmüller makes a strong "Plea for Trees and Parks" in cities. After giving a brief account of what a number of foreign and American cities have already done in this way, he outlines a scheme for extended park improvements in New York, which shows not only an eye keen to seize upon every technical and natural advantage offered by various park sites but also a thorough local knowledge of the neighborhoods most needing such improvements. The following are Mr. Windmüller's principal suggestions:

"In the first place and above all, I desire to call attention to the shore-line running parallel to Blackwell's Island. Owing to the strong currents at Hell Gate, the entire stretch between the Long Island and the Astoria ferries—that is, from Thirty-fourth Street to Ninety-second Street—is unadapted to the landing of cargoes, and consequently is almost entirely devoid of piers; only a few being used for the landing of coal and lumber. If the entire river front were converted into a shore park, instead of the twelve acres north of Eighty-fourth Street, and the square bounded by Thirty-fifth and Thirty-sixth Streets, between First and Second Avenues, the change would materially benefit the greatly congested German and Irish districts of the East Side, and at the same time increase the taxable value of the adjacent property. Unless heroic measures are taken this section will eventually become the Whitechapel of New York. In the streets between First and Second Avenues many vile resorts are found, while the space between First Avenue and the river has been appropriated for gas-works, malt-houses, and abattoirs."

"It has been proposed to convert the section extending from Fifty-second to Fifty-fourth Streets, and as far back as Eleventh Avenue, into a pleasure-ground—the 'De Witt Clinton Park.' * * * * Undoubtedly, Clinton Park will serve to improve the condition of its immediate environment; but it is altogether too limited in area to exert a favorable influence upon the district as a whole. A far greater improvement is now possible, in view of the fact that the growing necessity of building piers along the entire North River front will in turn lead to the construction of a broad marginal avenue from the Battery to Fifty-ninth Street. Evidences of such an avenue are already visible at Christopher Street and at various points along the Battery. What a

splendid opportunity for small parks would be here afforded! From Manhattan Market, at the foot of Thirty-fourth Street, to the terminus, a strip of land might be reserved—except at street crossings—wide enough for a continuous line of small parks similar in size to those extending along Park Avenue. The only requisite here would be proper soil, banked sufficiently high to admit of the planting of numerous trees."

"If owners of large tracks of real estate, now remaining unimproved, were to assist in making such a betterment along the river, they would soon be repaid by finding lucrative employment for their property. Since the Back Bay of Boston was redeemed, the district has been transformed from a morass into the proudest quarter of the American Athens. Within three years from the time that work was actually begun (1877), the surrounding estates had risen 50 per cent in value; and this transformation has now spread far beyond Brookline. Similar improvements in New York would be attended by equally beneficial results; and instead of being ashamed of the gates to our city, as we now must be, we should become proud of them. Wherever passengers descend from boat or bridge they should be welcomed on our shores by a strip of greensward. As the tourist approaches harbors of the Mediterranean lying in the same latitude as our own, his eye everywhere beholds busy quays fringed with fresh verdure; when he ascends the North River, he gazes upon a succession of nuisances all the way from the Cunard dock to Seventy-second Street. The contemplated extension of Riverside Drive Park to Spuyten Duyvil has been estimated to cost $30,000,000, and will, when finished, benefit for some time to come a very limited number of people: a small expenditure for the modest extension of Riverside Drive to the south would at once benefit a great portion of the population, and perhaps clear the entire shore of crime."

"One of the sanitary improvements perfected in London has been the conversion of a number of abandoned graveyards into public squares. We also have made a beginning in this direction—I refer to the obliteration of the cemetery at the corner of Hudson and Leroy Streets. Similarly, the "Small Park Commission" of 1897 has recommended the condemnation of Marble Cemetery, hidden between First and Second Avenues, and Second and Third Streets. This also might be well utilized as a recreation ground for children. Almost the entire square between Eleventh and Twelfth Streets, and between Avenue A and First Avenue, is filled with time-worn gravestones. This dismal spot might well be converted into a playground, more particularly as it would form an admirable annex to Tompkins Square, where, as in other small parks, children are not permitted to play on the grass."

Mr. Windmüller's reference to the financial side of park administration is very striking. He cites the following table showing total annual expenditure of four of the most important cities in the world together with the amounts spent by each in park improvements:

	TOTAL BUDGET.	FOR PARKS, ETC.
London	$68,739,000	$537 950
Paris	71,735,000	500,700
New York	92,520,000	1,729,000
Chicago	32,000,000	1,250,000

"Those," he adds, "who know the advantages of London and Paris over New York and Chicago, and compare the economical administration of those cities with our own, will appreciate that we have still some lessons to learn in municipal government."

BIBLIOGRAPHICAL INDEX.

KEY TO ABBREVIATIONS.

BRITISH AND AMERICAN PERIODICALS.

American Architect, Boston	W	Am. Arch.
American Ecclesiastical Review, New York	M	Am. Ecc. R.
American Economic Association Publications, New York	B-M	Am. Econ. Assoc.
American Electrician, New York	M	Am. Elec.
American Federationist, Washington	M	Am. Fed.
American Gas Light Journal, New York	W	Am. Gas Light J.
American Historical Review, New York	Q	Am. Hist. R.
American Journal of Science, New Haven	M	Am. J. Sci.
American Journal of Sociology, Chicago	Q	Am. J. Sociol.
American Law Review, St. Louis, Mo.	B	Am. Law R.
American Monthly Review of Reviews, New York	M	Am. R. of Rs.
American Public Health Association, Concord, N. H.	Q	Am. P. H. Assoc.
American Statistical Association Publications, Boston	Q	Am. Statis. Assoc.
Annals of the American Academy of Political and Social Science, Philadelphia	B-M	Ann. Am. Acad. Pol. Sci.
Architect, London	W	Arch.
Architectural Record, New York	Q	Arch. Rec.
Architectural Review, Boston	S-Q	Arch R.
Architecture and Building, New York	W	Arch. & Buil.
Arena, Boston	M	Arena.
Atlantic Monthly, Boston	M	Atlan.
Bankers's Magazine, London	M	Bank. M. (L.)
Bankers's Magazine, New York	M	Bank. M. (N. Y.)
Bibliotheca Sacra, Oberlin, O.	Q	Bib. Sacra.
Blackwood's Magazine, Edinburgh	M	Blackw.
Board of Trade Journal, London	M	Bd. Trade J.
British Architect, London	W	Br. Arch.
Builder, London	W	Builder.
Bulletin of the Department of Labor, Washington	B-M	B. Dept. Labor.
Canadian Architect, Toronto	M	Can. Arch.
Canadian Electrical News, Toronto	M	Can. Elec. N.
Canadian Engineer, Montreal	M	Can. Eng.
Canadian Magazine, Toronto	M	Canadian M.
Cassell's Family Magazine, London	M	Cassell's.
Cassier's Magazine, New York	M	Cassier's.
Century, New York	M	Cent.
Chamber's Journal, Edinburgh	M	Chamber's.
Charities Review, New York	M	Char. R.
Charity Organisation Review, London	M	Char. Or. R.
Chautauquan, Cleveland, O.	M	Chaut.
City and State, Philadelphia	W	City & State.
City Government, New York	M	City Govt.
City Record, Boston	W	City Rec.
Commons, The, Chicago	M	Commons.
Commonwealth, New York	W	Commonw.
Consular Reports, Washington	M	Cons. Rep.
Contemporary Review, London	M	Contemp.
Cornhill Magazine, London	M	Cornhill.
Cosmopolitan, New York	M	Cosmopol.
Dial, Chicago	S-W	Dial.
Direct Legislation Record, Newark, N. J	M	Dir. Leg. Rec.
Dublin Review, London	Q	Dub. R.
Eclectic Magazine, New York	M	Ecl. M.
Economic Journal, London	Q	Econ. J.
Economic Review, London	M	Econ. R.
Economist, Chicago	W	Economist.
Edinburgh Review, Edinburgh	Q	Ed. R.
Education, Boston	M	Educa.
Educational Review, London	M	Educa. R. (London.)
Educational Review, New York	M	Educa. R. (N. Y.)
Electrical Engineer, London	W	Elec. Eng. (L.)
Electrical Engineering, Chicago	M	Elec. Engng.
Electrical Review, New York	W	Elec. R.
Electrical World and Electrical Engineer, New York	W	Elec. W. & E.
Electrician, London	W	Elec'n.
Electricity, London	W	Elec'y (L.)
Engineer, The, London	W	Eng.

Engineering, London	W	Engng.
Engineering Magazine, New York	M	Engng. M.
Engineering News, New York	W	Engng. N.
Engineering Record, New York	W	Engngr. Rec.
English Historical Review, London	Q	Eng. Hist. R.
Fire and Water, New York	W	Fire & W.
Fortnightly Review, London	M	Forts.
Forum, New York	M	Forum.
Gas World, London	W	Gas W.
Green Bag, Boston	M	Green B.
Gunton's Magazine, New York	M	Gunton's.
Harper's Magazine, New York	M	Harper's M.
Harper's Weekly, New York	W	Hrprs. Wkly.
Illinois Society of Engineers and Surveyors, Peoria		Ill. Soc. Eng.
Independent, New York	M	Ind.
Indian and Eastern Engineer, Calcutta	W	Ind. & East. Eng.
Indian Engineering, Calcutta	W	Ind. Engng.
International Review, New York	M	Internat. R.
Johns Hopkins University Studies in History, etc., Baltimore.		J. H. Univ. Studies.
Journal of the Association of Engineering Societies, Philadelphia.	M	J. Assoc. Engng. Soc.
Journal of the Department of Labor, Wellington, New Zealand	M	J. Dept. Labor.
Journal of Finance, London	M	J. Finance.
Journal of the Franklin Institute, Philadelphia	M	J. Frankl. Inst.
Journal of Gas Lighting, London	W	J. Gas Light.
Journal of the New England Water-Works Ass'n, New London, Conn.	Q	J. N. E. W. W. Assoc.
Journal of Political Economy, Chicago	Q	J. P. E.
Journal of the Royal Statistical Society, London	Q	J. R. Stat. Soc.
Journal of the Sanitary Institute	M	J. San. Inst.
Journal of Social Science, Boston	Y	J. Soc. Sci.
Journal of the Society of Arts, London	W	J. Soc. Arts.
Journal of the Society of Comparative Legislation, London	Q	J. Soc. Comp. Leg.
Journal of the Western Society of Engineers, Chicago	B-M	J. W. Soc. Eng.
Kindergarten Magazine, Chicago	M	Kindergarten M.
Labor Bulletin of the Commonwealth of Massachusetts, Boston.	Q	Labor Bulletin, Mass.
Law Magazine and Review, London	M	Law M. & R.
Leslie's Weekly, New York	W	Leslie's Wkly.
Library Journal, New York	M	Lib. J.
Lippincott's Magazine, Philadelphia	M	Lippinc.
Literary Digest, New York	W	Lit. Dig.
Longman's Magazine, London	M	Longm.
Macmillan's Magazine, London	M	Macmil.
McClure's Magazine, New York	M	McClure's.
Merchant's Association Review, San Francisco, Cal.	M	Mchts. Assoc. R.
Municipal Engineering, Indianapolis, Indiana	M	Mun. Engng.
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Municipal and Railway Record, New York	M	Mun. & Ry. Rec.
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Munsey's Magazine, New York	M	Munsey's.
Nation, New York	W	Nation.
National Review, London	M	National R.
New Century Review, London	M	New Cent. R.
New England Magazine, Boston	M	New Eng. M.
New Review, London	M	New R.
New York Education, Albany	M	N. Y. Educa.
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North American Review, New York	M	No. Am.
Open Church, New York	Q	Open Church.
Open Court, Chicago	M	Open Court.
Our Country, New York	M	Our Country.
Our Day, Boston	M	Our Day.
Outlook, New York	W	Outlook.
Overland Monthly, San Francisco, Cal.	M	Overland.
Park and Cemetery, Chicago	W	Park & Cem.
Political Science Quarterly, New York	Q	Pol. Sci. Q.
Popular Science Monthly, New York	M	Pop. Sci. Mo.
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Scottish Review, London	Q	Scottish R.

SCRIBNER'S MAGAZINE, New York....M	Scribner's.
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ARCHIV FÜR OEFFENTLICHES RECHT, Freiberg....Q	Ar. Oef. Rt.
ARCHIV FÜR SOZIALE GESETZGEBUNG UND STATISTIK, Berlin....B-M	Ar. Soz. Gesetz. Stat.
BIBLIOTHEQUE UNIVERSELLE, Brussels....M	Bib. Univ.
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DEUTSCHE REVUE, Stuttgart....M	Deut. R.
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DEVENIR SOCIAL, Paris....M	Dev. Soc.
ELEKTROTECHNISCHE ZEITSCHRIFT, Berlin....M	Elek. Zeit.
ESPAÑA MODERNA, Madrid....M	Esp. Mod.
FINANZ-ARCHIV, Stuttgart....S-Y	Finanz-Ar.
GÉNIE CIVIL, Paris....W	Génie Civil.
GESUNDHEITS-INGENIEUR, Munich....B-W	Gesund.-Ing.
GIORNALE DEGLI ECONOMISTI, Roma....M	G. Degli Econ.
HISTORISCHE VIERTELJAHRSCHRIFT, Leipzig....Q	Hist. Vier.
HISTORISCHE ZEITSCHRIFT, Munich and Leipzig....Q	Hist. Zeit.
HISTORISCHES JAHRBUCH, Munich....Q	Hist. Jr.
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REVUE POLITIQUE ET PARLIAMENTAIRE, Paris....M	R. Pol. e. Par.
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REVUE DES QUESTIONS SCIENTIFIQUES, Brussels....W	R. Ques. Sci.
REVUE DES REVUES, Paris....S-M	R. Revs.
REVUE SCIENTIFIQUE, Paris....W	R. Sci.
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REVUE TECHNIQUE, Paris....B-W	R. Technique.
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INDEX FOR THE QUARTER, MARCH—JUNE, 1900.

(NOTE.—The following subject index is intended to continue the work began in the first (March, 1897) issue of MUNICIPAL AFFAIRS, which was entirely devoted to a Bibliography of Municipal Administration and City Conditions. In subsequent numbers, the Index was made complete to December 1st. So far as possible all books, reports, pamphlets and magazine articles of interest to students of city government which have appeared during the past three months, December, 1899—March, 1900, are included in the following list. Future numbers of MUNICIPAL AFFAIRS will contain similar indices covering the literature of each preceding quarter.)

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BIOGRAPHICAL NOTICES

OF THE

WRITERS IN MUNICIPAL AFFAIRS FOR JUNE, 1900.

JOHN DE WITT WARNER.—Born October 30, 1851, in Schuyler Co., New York. Entered Cornell the first day it opened; graduated 1872. Edited *Ithaca Daily Leader* three months; was professor of Latin, German and Elocution two years at Ithaca Academy, and two years at Albany Academy. Studied law at Albany Law School, whence graduated and was admitted to the bar June, 1876. Member of the Albany Greek Club and Albany Institute, which published his "Solar Theory of Myths." Came to New York after 1876, where has since practiced law as member of the firms, first Iselin & Warner, Warner & Frayer, and at present of Peckham, Warner & Strong. Elected to the Fifty-second Congress from the greatest manufacturing district in America, and returned to the Fifty-third Congress from a new district comprising part of his old one, and this time the wealthiest parliamentary constituency in the world. In Congress was Chairman of the House Sub-committee to investigate the sweating system. Took an active part in the repeal of the purchasing clause of the Sherman Act and Federal Election laws, and in the passing by the House of the Wilson Tariff bill, to which he secured the "free sugar" amendment. Strenuously advocated the Torrey Bankruptcy bill and opposed the Bland Seignorage bill. Secured investigation of Federal building matters at New York, which has resulted in important reforms and large appropriations for construction and repairs. In the Fifty-third Congress was the sole representative for New York state and city on the House Committee on Banking and Currency, and a leader in debate in both the Fifty-second and Fifty-third Congresses on tariff, financial and commercial matters. In the Fifty-third Congress was prominent in leading the fight for free sugar, and especially in exposing the Sugar Trust. Took a leading part in the discussion of the repeal of the ten per cent tax on State Bank issues, and led in opposition to the Anti-option bill. Was prominent in agitation for reform in Cornell University matters, and was elected Alumni Trustee in 1882 and again in 1894, in each case for a five-year term. One of the founders of Shakespeare Club of New York city, and author of "Sound Sequence in Shakespeare" and other papers on Shakespearian subjects. A writer and speaker on tariff reform; was one of the founders of New York Reform Club; author of numerous pamphlets on tariff matters, and Tariff Reform Editor of New York *Weekly World* during campaign 1892; Chairman Reform Club's Tariff Reform Committee, 1889-1891; Chairman Reform Club's Sound Currency Committee, 1895–1896; President of the Reform Club and Chairman of its Committee on Municipal Administration, 1897. Has done extensive editorial work in connection with a number of periodicals, and has been contributor to many more, including *Die Zeit*, of Vienna; *Law Times*, of London; the *Century*, *Forum*, *Harper's Weekly* and numerous political, financial and economic periodicals.

JOHN ROGERS COMMONS.—Born at Hollandburg, Ohio, in 1862. Educated in public schools and graduated at Oberlin College. Studied political science at Johns Hopkins University in 1889–90, receiving the degree of A. M. from Oberlin in 1890. Was associate professor of political economy at Oberlin in 1891–92; for three years professor of political economy and social science in Indiana University, and four years at Syracuse University. Since 1899, director in the Bureau of Economic Research, New York city. Author of "Distribution of Wealth" (1893); "Social Reform and the Church" (1894); "Proportional Representation" (1896); "State Supervision for Cities," *Annals* (1895); "Taxation in Chicago and Philadelphia," *Journal of Political Economy* (1895); Day Labor and Contract Systems on Municipal Works," *Yale Review* (1897); A Sociological View of Sovereignty," *Amer. Jour. of Sociology*, July, 1899, and following.

A. S. BALDWIN.—Born in Winchester, Virginia, November 2, 1857. Went to California in 1879. Has been engaged in the real estate business in San Francisco since 1885. Has been active in all movements looking to the improvement and beautifying of San Francisco, and Vice-President of the Merchants' Association for three years, through the efforts of which organization San Francisco obtained a new charter and voted a bond issue last December for a new sewer system, new school buildings, and the extension of Golden Gate Park to the center of the city.

JOHN JAY CHAPMAN.—Born in New York, 1862, graduated from Harvard in 1884. Admitted to the bar in 1889 and has since practiced law in New York City. Has written *Emerson and Other Essays*, *Causes and Consequences*, *Practical Agitation*, besides many magazine articles upon political and current topics. Is editor of *The Political Nursery*, a monthly leaflet of opinion.

ABNER SHERMAN HAIGHT.—A native of Columbia County, N. Y. Son of a farmer and was educated in the district school. Has been engaged in mercantile persuits in this city since 1860. Is an ultra-Republican but strongly opposed to boss rule and "organization" methods. Was treasurer of the Committee of one hundred in the Schieren campaign, also of the Committee of Citzens who prosecuted John Y. McKane and of the Committee of fifty of Brooklyn in the Low campaign. Was a delegate to the Saratoga Convention in 1896 where his opposition to the "unit-rule" in the Kings County delegation defeated Aldridge's nominiation on the second ballot. Has been severely criticised by Republicans for his independent action in the state campaign of 1898, but it is now generally conceded that his position was honestly taken, right, logical and in advance of his party.

JOHN W. KELLER.—Born in Bourbon County, Kentucky, July 5, 1856; all of his parents and all of his grand-parents were Kentuckians by birth, and his great-grandparents came from Virginia and North Carolina when Kentucky was a wilderness. Worked on a farm until eighteen years of age, when he went to New Haven, Connecticut, and was educated in the Hopkins Grammar School and at Yale College. While at Yale was a member of the University Crew and established the *Yale Daily News*. Came to New York in 1879 and entered journalism. For eighteen years worked as Reporter, Dramatic Critic and Editor. Among the newspapers for which he wrote were the New York *Times*, the New York *Journal*, the New York *Press* and the New York *Recorder*. Also wrote for magazines and periodicals. Was twice elected to the Presidency of the New York Press Club. In 1886 wrote a play which was produced throughout the country by Robert Mantell for one season and was played at the Fifth Avenue Theater in New York City for a run of ten weeks. In 1898 left journalism to accept the Presidency of the Department of Public Charities for the City of New York. In politics has always been a Democrat. Took the stump for Bryan in 1896 and has sup-

ported the Nebraskan's claim to the Presidency of the United States ever since. Is an uncompromising adherent of Tammany Hall, being a member of the Executive Committee of that Organization and a Sachem of the Tammany Society. Is President of the Democratic Club of the City of New York and a member of the Clover Club of Philadelphia. Was named by the New York delegation to the Kansas City Convention as a candidate for Vice-President.

EDWIN BURRITT SMITH—Born in 1854 at Spartansburg, Pa. Was taken by an uncle to central Illinois when six years old, where he grew up as a farm hand. By his own efforts, procured an education at Oberlin College, Northwestern University and Yale University. Since 1881 has been in active practice in law at Chicago. During 1884 and 1885 edited many volumes of the United States Supreme Court for the new edition. Was nominated for Congress in the First District, Chicago, by the Democratic party in 1892, and received almost half of the total vote, although the district is ordinarily heavily Republican. Was recently Chairman of the American Honest Money League, and did active work for Sound Currency during the last presidential election. Is also a prominent member of the National Sound Money League. Has taken an active part in non-partisan municipal politics in Chicago, and since its organization has been vice-president of the Municipal Voters' League.

GEORGE G. WRIGHT.—Born in Cambridge, Oct. 7, 1848. Educated in the public schools of Cambridge, entering business at an early age. Although a successful business man, has always taken an active interest in civil service reform and non-partisan nominations. Has been treasurer of the Cambridge Civil Service Reform Association since its organization in 1881 and of the Prospect Union Association, an organization of workingmen and Harvard students formed for mutual improvement. Was a member of the Republican ward and city committee for several years prior to 1884, in which year he was elected delegate from Massachusetts to the conference of Independents held in New York, and during the campaign traveled widely over the United States as representative of the national committee. Was one of the organizers of the Library Hall Association and its secretary from beginning until 1900. Probably no one has been more intimately acquainted, or has taken a more active part in the work of the Association than he.

ROBERT C. BROOKS.—Born in Piqua, Ohio, February 7, 1874. Educated in the public schools of Cambridge City, Indiana; graduated from the Cambridge City High School in 1890, and from the department of economics and social science at Indiana University in 1896. Editor of MUNICIPAL AFFAIRS and Secretary of the Reform Club Committee on Municipal Administration, 1896–7. Resident at the University Settlement, New York, 1896–7. Published *A Bibliography of Municipal Administration and City Conditions* (New York Reform Club, 224 pp.), in 1897. Elected to the President White Fellowship in Political and Social Science at Cornell University for 1897–8. Reappointed for 1898–99, spending the year in study and travel in Germany. At present is instructor in the Department of Political Science at Cornell University with special courses in municipal government.

THOMAS R. SLICER.—Born in the City of Washington in 1847. His father was the Rev. Henry Slicer of the Baltimore Conference of the Methodist Episcopal Church; known throughout the South as the "War-horse of Methodism," as the tribute to his power as a debater, and his interest in the ecclesiastical administration in the Methodist Episcopal Church. Educated in the common schools and the City College of Baltimore, and received the honorary degree of M.A. from Dickinson College in 1871. Entered the ministry of the Methodist Episcopal Church in 1869, and served for ten years.

The last eighteen years, has been associated with the Unitarian denomination, serving churches in Providence, R. I., Buffalo, N. Y., and now minister of the Church of All Souls, New York City. Has been actively engaged for the past ten years with civic interests, and a member of the committee of the Good Government Club Council in the City of Buffalo, where the Independent vote in municipal affairs holds the balance of power, through the work of the Good Government clubs in that direction. Took charge of the Church of All Souls some three years ago, and has been actively engaged with the City Club of New York, in which he is chairman of the municipal government committee, members of which brought charges against the District Attorney of the County of New York in October last; the hearings upon these charges are now closing.

ROBERT A. WOODS.—Born at Pittsburg, Pa., December, 1865. Graduated from Amherst College in 1886. Was a special student at Andover Theological Seminary from 1886 to 1890; resident at Toynbee Hall, London, 1890. Has been head of the Andover (now the South End) House, Boston, since 1891. Is a member of the Department of Public Baths and Gymnasiums, Boston. Author of "*English Social Movements*," 1891. Editor of "*The City Wilderness*," 1898. Lecturer at the Episcopal Theological School, Cambridge, and at the School of Administration and Finance, Dartmouth College.

BOLTON HALL.—An Irishman, about forty-five years of age, who forsook the landlord isle some thirty years ago. Organized the New York Tax Reform Association and was the treasurer of the Longshoreman's Union; which last, under McHugh's management, acquired a membership of 18,000 in three years and went to pieces from sheer inability of uneducated men to hang together. Acted as Mayor Pingree's lieutenant in extending the scheme of cultivation of vacant lots by the unemployed to New York and thence to Philadelphia, Wilmington and about a dozen other cities, where it is still in successful operation. For ten years has been an ardent advocate of the single-tax doctrine. Pleasant fictions are told about his being disinherited by his father on account of his radical views and about his nevertheless paying half a million dollars' worth of outlawed debt with an inheritance from his father that did not amount to a fraction of that sum. However, a large number of debts were voluntarily settled, most of which had little moral or legal obligation. Is the author of *Things as They Are*, *Even as You and I*, and many magazine articles.

ERNEST HOWARD CROSBY.—Born Nov. 4, 1856, Graduated from N. Y. University, 1876, and Columbia Law School, 1878. Practiced law until 1889. Member of N. Y. Assembly, 1887-9. Judge of International Tribunal at Alexandria, Egypt, 1889-1894. First President of Social Reform Club. President of People's Club and N. Y. Anti-Imperialist League. Author of *Plain Talk in Psalm and Parable*, and many magazine articles.

MUNICIPAL AFFAIRS.

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A NEW CHARTER FOR GREATER NEW YORK.

Revision of city charters has been a favorite occupation in most American cities. When anything connected with the city government goes wrong, the first impulse is to tinker the charter. Thus within three years after the initiation of Greater New York, another revision commission is appointed whose efforts, although commendable, promise no more permanent relief than preceding attempts to formulate a municipal system.

It is now time to pause and ask whether the theory upon which many cities have been working is not wrong, whether a charter which requires or leads to constant alteration is not erroneous in principle rather than in detail? Unquestionably, an affirmative answer must be given. But what is to take its place?

A NEW MUNICIPAL SYSTEM.

The main lines to be followed are:

I.—The insertion in the state constitution of all general provisions relating to cities, their organization and powers, concerning which there is little or no difference of opinion, thus removing from the sphere of party politics the fundamental principles of the municipal system.

II.—The separation of the present charter and the innumerable local acts into two parts: a Charter and a Municipal Code.

III.—The Charter should be very brief, leaving to the Code minor matters and the application in detail of the powers granted to the municipal authorities. It should prescribe:

(1)—The boundaries of the city.

(2)—The general form of government, naming the principal

departments, apportioning their powers in general terms, fixing their salaries, etc.—but not descending into details.

(3)—A general statement of the municipal powers conferred, including those provisions which are too experimental for insertion in the constitution and too important to leave exclusively to municipal regulation. Upon the whole, it should provide for far greater freedom of action than at present.

(4)—Method of amendment—as at present—only by general law or local act subject to veto by the mayor and re-enactment by the legislature.

IV.—The Municipal Code should consist of:

(1)—Regulations in detail regarding municipal matters, which occupy nine-tenths of the present charter.

(2)—The more important provisions to be found in the various codes, orders, regulations, etc., issued by the various city departments. Regulations which cannot be applied to the city as a whole should be placed in separate sections.

(3)—Provisions as to amendment, which should be as follows: Any change or addition to the code may be made by first having been approved either by the local boards or the council (whatever that body may be called) of the entire city and then submitted to some state board which should have power to approve or reject but not amend. In case the proposed amendments are approved, they become a part of the code. Amendments relating to health matters should go to the state board of health, civil service to the civil service commission, educational to the superintendent of the public instruction, etc., and matters with which no state board is at present concerned should go to a municipal government board to be of similar character to the other boards just mentioned.

V.—In order to carry out these ideas and to establish a charter and code as nearly perfect as possible, a new charter commission should be appointed, or the present one continued, with power to employ a large number of experts and to secure the co-operation of every city department. The charter and code so drawn should be submitted to the legislature and the code, par-

ticularly, enacted without alteration. All constitutional amendments would follow the form provided by the constitution.

VI.—In framing the Charter the following principles should be recognized:

(1)—The mayor's power of removal should be unlimited, all chiefs of departments and important boards being appointed by him. He should have the veto power, but the council should have power to pass any measure over his veto by a two-thirds vote.

(2)—Executive departments should be single-headed, except possibly those of education, taxes and assessments and civil service. The term of office should be unlimited.

(3)—Subordinates in every departments should be chosen by the chief, subject to civil service rules.

(4)—The powers of each department should be fixed in general terms, and within the field so delimited, the head of the department should have entire freedom to apportion the authority and duties.

(5)—The council should be composed of the comptroller, chiefs of a few of the principal departments, and ten or fifteen councilmen elected under a scheme of proportional representation from the city at large.

(6)—The council should have legislative power for the whole city, and ordinances now issued by the various departments should not be considered of any force except as provided in section IV, paragraph (3) above. Most of the powers at present belonging to the board of public improvements, the municipal assembly and the board of estimate and apportionment should be given to the council which, instead of being called the council, might retain the name, "Board of Estimate and Apportionment."

(7)—In each borough, boards or councils should be created having local legislative powers and the authority to provide by means of special assessment for the initial expenditures of all public works that are local in character.

To appreciate fully why these suggestions are believed to offer the best solution of our present difficulties, as far as governmental

forms can do so, it is necessary first to understand what defects in present municipal system should be corrected, what errors are to be remedied.

The most important is the method whereby the laws governing the city of New York are amended, for unless some definite change is made, charter revision will continue to be a spasmodic fad, diverting attention from other and more vital questions.

The first thing to be considered is, therefore, the relation of the state legislature to the city.

SPECIAL LEGISLATION—ITS EVILS.

The present situation is well known. The city of New York is governed from the state capitol. Scores of laws are passed every year relating to matters of purely local interest and of minor importance. A bill for a park, in a densely populated portion of the city, is introduced at Albany and perhaps passed with little regard as to whether the city or the people of the locality desire its enactment. If an applicant for a position upon the police force is an inch shorter than the requirements demand, he tries to secure a special act of the legislature authorizing or compelling the police department to appoint him. Or if some charitable organization wishes to be exempted from the water rate, it also proceeds to Albany; and so on *ad infinitum*.

This mass of legislation which flows into Albany from every portion of Greater New York and from every other city, overburdens the state legislature. If every bill of local interest were thoroughly considered, nothing else could be accomplished, and the interests of the state would be neglected. As it is, the less important bills are either not considered at all, or are enacted because no one takes the trouble to oppose them, and because the senator or assemblyman from the district affected is especially persistent. The temptation is very strong for members of the legislature, being perhaps more interested in their own local bills than in the measures affecting the entire state, to push the former to the exclusion of the latter. Every legislator recognizes this fact and invariably expresses the opinion that he would be glad to see some method invented whereby this large amount of local legislation could be done away with entirely or reduced to a minimum. But as long as legislatures deal with local matters, each must see that his bills are passed in order to secure the support of his constituency.

However greatly opposed by members of the legislature and however injurious to the state, it is even more vigorously condemned by and more injurious to the city. Local bills, instead of being acted upon in accordance with the desires of the locality, are often made the football of state politics. Important acts are passed without consulting the city or the authorities affected, and in order to be protected, every interest or person likely to be affected must carefully watch the legislature for fear that without due notice and in some unexpected way, irreparable injury will be done.

CAUSES AND REMEDIES.

This tendency to disregard local interests and to enact laws without careful examination is not the fault of the men that are elected but of the system which permits such methods to exist. The "country members" are no worse, and perhaps somewhat better, than the members from Greater New York and other cities, but it is absolutely impossible with the present large amount of special legislation to examine each bill and to enact or reject it upon its merits alone. In the early part of the present century, England had the same system of dealing with local bodies, and the results were precisely similar to those with which we are so familiar. And so long as the charter particularizes with such detail as at present the form of government and the powers of the various authorities, and so long as the only method of amending it is through legislative enactment, appeals will be made to Albany and bills will be introduced to authorize or compel the city authorities to perform certain acts.

This relation of cause and effect between elaborate charters and special legislation is proved by abundant experience. Wherever charters have dealt with municipal affairs in general terms *only*, there one finds almost no special legislation; but where charters have gone into great detail, as in New York, one always finds a plethora of local laws enacted yearly.

This fact suggests a remedy, namely, the inclusion in city charters of only a general statement of the form of government and of the powers conferred. Such a charter would specify whatever the interests of the state at large demanded, and as to which the city should have no voice. While in a measure this would be taking from the state legislature some of its functions, it would be taking away only those from which at present it

desires to free itself and only those which are not of interest to the state at large.

BENEFICIAL RESULTS.

The results of such a system would be, first, to decrease special legislation; second, to give to the state legislature more time to discuss matters of interest to the whole state; and, third, to differentiate responsibility so that disputes could not arise as to whether the state or the city was responsible for misgovernment.

That these results *would* follow is shown by the experience of foreign and American cities. Great Britain, which has universally adopted the idea, annually passes fewer laws regarding municipal matters than are enacted by New York state—only one of our commonwealths. Of the legislative bodies of Continental Europe, not one is so occupied with local matters as the legislature of Ohio, for example. The charter of Chicago occupies but a few pages, and consequently New York state passes scores of laws regarding Greater New York where Illinois passes one for Chicago.

PURPOSE OF THE CODE.

The only possible objection to the substitution of a short charter of a very general character for the present voluminous charter, would be that the city cannot be trusted to exercise such general powers as would be thereby conferred, and that persons dissatisfied with local conditions would immediately appeal to the state legislature and thus again bring upon us the deluge of special legislation from which we are at present trying to escape.

To prevent these results a municipal code is proposed. If originally prepared with the care suggested, it would be as nearly perfect as possible to make it, and would not call within the near future for very important amendments. However, changes undoubtedly would need to be made, and as this became necessary, ordinances would be proposed by the various departments, presented to the local legislative authority and then sent to the appropriate administrative board at Albany, going into force upon being approved.

The advantages of this over the present system are: The proposed amendment would be thoroughly examined into; no action would be taken until all the parties concerned had had ample opportunity to be heard; and the board, being an ad-

ministrative authority, would not be influenced by the considerations which influence the state legislature and would give an impartial and well-considered decision. By this means, there would be provided a simple, easy and safe method of amending the code. And at the same time, the interests of the state would be safeguarded wherever they enter, and a check established upon hasty and ill-advised action by the local authorities. Yet the local authorities would have much more power than they have at present, and the responsibility for conditions would be entirely clear.

This plan may seem somewhat novel, but in substance it has been found to work well in England, which is considered the home of self-government, not to mention Continental cities. It is also known to very many of our states, where boards of health, superintendents of public instruction and boards of charities have existed for some time. The almost universal opinion is that not only has governmental efficiency greatly increased wherever the idea has been adopted, but that the feeling of home rule has grown stronger and state interference weaker. Its adoption is urged, therefore, not only because it will benefit the city, but because it will be of equal benefit to the state, and because it will go a long way towards solving the problem of home rule.

RESPONSIBILITY SHOULD BE CENTRALIZED.

The first important suggestion, regarding the organization of the city government, as provided in the charter and the code, is the centralization of responsibility. In accordance with the political ideas inherited from Europe and the principles followed in the organization of our national government, we have decentralized municipal administration and established various authorities which are almost independent within their own spheres. As a result, the boss has been developed to supply the need for some one person or authority who should have control over these various semi-independent bodies. Now the chief criticism against the boss is that he is an irresponsible personage that cannot be punished for failing to follow the popular will. If he were made responsible, the evils with which we have become so familiar would largely vanish. All do not agree that it would be advisable to center all power, legislative, executive and judicial, in one person or in one authority, but the advisability of centralizing administrative responsibil-

ity is seldom questioned. The new charter, therefore, should give the mayor ample power to appoint and remove at any time the heads of the various departments which in turn should have similar powers over their subordinates, subject, of course, to the best civil service regulations.

Carrying this idea further, the ordinance power which is now in considerable measure exercised by the various departments, should be lodged with the legislative authority, although the different departments would continue to draft ordinances and submit them to the council. The idea of having many departments, each with full power to enact by-laws upon certain subjects, is not only repugnant to sound political theory but does violence to common sense. When these powers have been transferred to the legislative authority as provided for below, there would be little need, except in a very few cases, of having other than single-headed departments. It would be a wise plan, however, in organizing the council to have a committee on each department, whose duty it should be to have accurate knowledge regarding the entire department, so that when questions came before the council for decision, it could give wise advice so far as the department with which it was connected was concerned.

WHAT SHALL BE DONE WITH THE COUNCIL?

In order to carry out such a plan, it would be necessary to establish a local legislative body or what would correspond to the municipal council in other cities. It is suggested, therefore, that the municipal assembly be abolished, that to the board of estimate and apportionment there should be added such a number of elective officers as would make it more popular and less administrative in character. In order, however, to secure the valuable advice and intimate knowledge of municipal affairs that the heads of the principal departments possess, it would be wise to make several of them members of the board, but so few in number that the appointees of the mayor would never have an undue amount of influence. It is suggested that the name, "Board of Estimate and Apportionment," be retained because of the prevalent dissatisfaction with the municipal assembly and the high esteem in which the board of estimate and apportionment has uniformly been held. This, would be a factor of some importance in persuading men of prominence to accept membership.

BOROUGH BOARDS.

In each borough there should be established a small borough board which should have a local ordinance power and the power of ordering local improvements, the expense of which should be borne by special assessment either in the locality or in the entire borough. This is suggested because the density of population varies so greatly from borough to borough that ordinances which are perfectly just and wise for one borough are wholly unnecessary in another; and because improvements that are desired by a locality and for which they are perfectly willing to pay should not be made to wait until the whole city appreciated the necessity and realized the wisdom of authorizing the expenditure.

In providing for the establishment of such boards provision probably should be made for some scheme of proportional representation, so that the minority party would be more fairly represented than at present, where a large number of voters have no representative whatever.

Beyond this, the city should be left to work out its own internal organization, so that whenever it becomes evident that the existing system is inefficient, the proper changes can be made without recourse to the state legislature. It is not to be supposed, however, that perfect municipal government can be secured either under this or under any other form of government unless public opinion is such as to demand that only the highest principles be recognized in municipal administration and that only the most efficient men be placed in office. This is more likely to be attained, however, when responsibility has been centralized and when power has been given the city to remedy conditions it does not approve of, than when it is almost impossible, or at least extremely difficult, for public opinion to make itself felt or when the city is governed from the state capitol.

RAPID TRANSIT SUBWAYS IN METROPOLITAN CITIES.

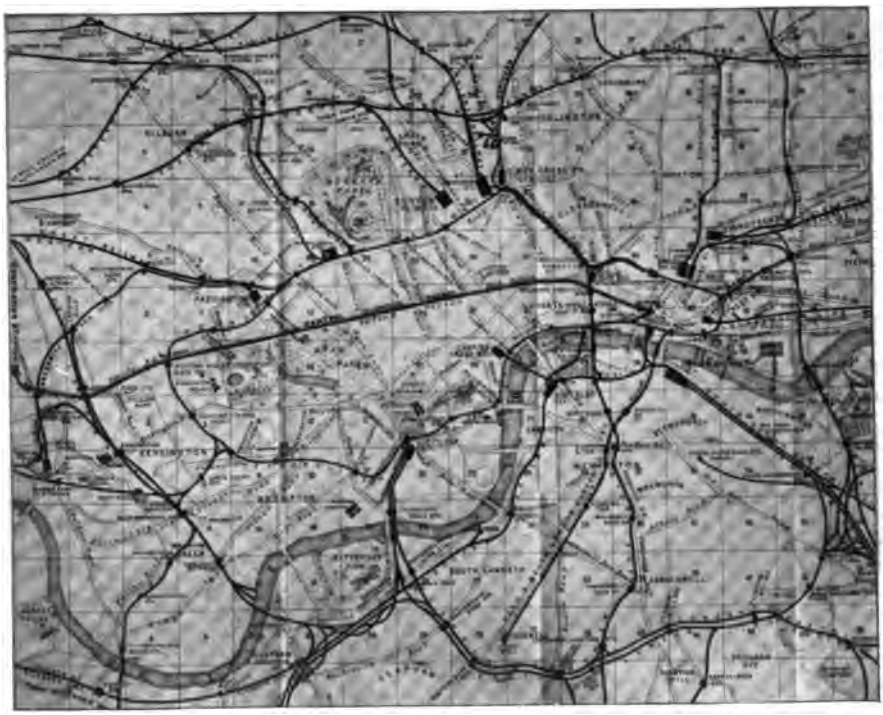
The problem of urban transportation is largely one of rapid communication between business and residential districts, and has grown increasingly difficult as population has become more and more concentrated. Street car companies have tried every conceivable kind of motive power, but they have not been able to keep up with the rapid growth. Steam railroads, which have proved so successful as inter-urban means of communication, have been excluded from most centers because of the noise, smoke and ugliness of the trains. Horse traction is not sufficiently rapid, and the cable for the same reason has given way to electricity.

However satisfactory surface lines may be for short-distance traffic, their inadequacy to deal with suburban traffic became apparent almost half a century ago in the larger urban centers. The steam roads undertook to solve this question by lowering fares and by greatly increasing the number of trains. London went a step further and built underground roads connecting most of the depots in the metropolis. Other cities, such as New York, Chicago, Boston, Liverpool and Berlin, have constructed elevated roads, but these are unsightly, and within the last few years they also have proved or are proving inadequate to deal with the vast throngs who daily leave their homes to seek work in other portions of the cities in which they live. And now, as the last resort, electric subways are proposed, and systems have been or are being built in Paris, Budapest, Glasgow, London, Boston and New York,[1] while other cities are considering the question.

RAPID TRANSIT IN LONDON.

Owing to the enormous cost of constructing underground roads, a large daily traffic is essential to successful operation. This condition appeared first in London. When railroads were

[1] Short sections of Berlin's elevated road are underground, but it has not been included in this article because so small a portion will be below the street level.



UNDERGROUND ROADS IN LONDON.

invented and their utility generally recognized, London was already a city of considerable size (population in 1851, 2,363,274). Its ancient streets were considered too sacred to be polluted by a noisy monster, and the importance of rapid communication between the central portion of the city and suburban areas was not yet recognized. Thus the first steam railroads were halted at the threshold of the inner city and made to build their terminal stations some distance from the center of commercial activity. With the growth of the city and the giving over of certain portions almost exclusively to business, some means of communication between the numerous depots became necessary. Steam surface roads were out of the question; electricity and cable traction had not been invented; and horse cars were too slow. Underground steam roads seemed the only alternative.

For years the construction of these lines went on, until at present there are 300 miles and upwards of 270 stations within a six-mile radius of Charing Cross. These railways probably

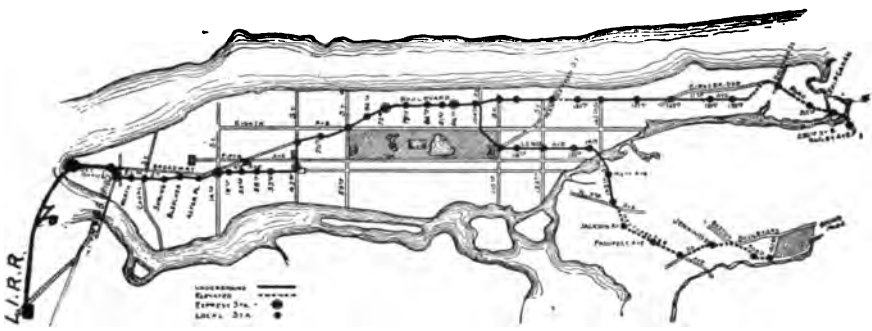
carry over 300,000,000 passengers annually, and including the omnibus, tramway, cab and steamer passengers, the total approaches very nearly 1,000,000,000 persons annually.

THE STEAM UNDERGROUND. LONDON.

The unpleasant features of travel in the "underground" — the dingy entrances, the dark tunnels, the dirty, crowded and dimly-lighted cars, the sulphurous fumes from the engines, the dirt-laden air— were appreciated from the start and grew worse as the traffic increased. The lines were mostly near the surface, and openings were provided at short intervals to permit the smoke, steam and gas to escape, but they very inadequately performed that function. The managers, with the characteristic English slowness to adopt new methods and the desire to make large profits, reminding one of the New York Manhattan Elevated Railway Company, refused to adopt electric traction, and until 1890 there was no method of rapid transportation in London other than the steam roads.

TICKET OFFICE ON THE CENTRAL LONDON.

In that year, the City and South London Electric Railway was opened, about three and one-half miles in length, extending from near The Monument in King William street, only a few blocks from the commercial center of the metropolis, to the suburban district of Stockwell upon the south side of the Thames. The success of this road and the desire for access to the heart of the city led the South Western Railway—one of the most important English roads—to construct a short electric line between its Waterloo station and the Mansion House, opposite the Bank of England. This line is very short, only one and one-half miles in length, but it does assist in solving the problem of urban transpor-



Courtesy of Scribner's Magazine.

NEW YORK SUBWAY.

tation in that it brings the suburban districts reached by the South Western into closer communication with the business portion of the city.

The Central London Railroad, the latest, largest and best equipped of all London subways, most nearly resembles, from the point of location, the New York subway. It runs from the Bank of England, under Cheapside, Newgate, Holborn Viaduct and Oxford Street, past St. Paul's Cathedral, Hyde Park and Kensington Gardens to a station in the suburban district of Shepherd's Bush, a total distance of six and one-half miles. There is a large traffic towards the Bank of England in the morning and to the West End in the evening, and the only means of transportation until lately was by omnibus or carriage, or a roundabout route via the underground. No tramway has been permitted to occupy this main artery, and the new underground road will greatly add to the transportation facilities of London.

Various other electric underground lines have been proposed, and within the near future, the Metropolitan and the Metropolitan District Railways, now operated by steam, will adopt electricity as a motive power. Bids and plans have already been called for.

BUDAPEST SUBWAY.

CONDITIONS IN BUDAPEST.

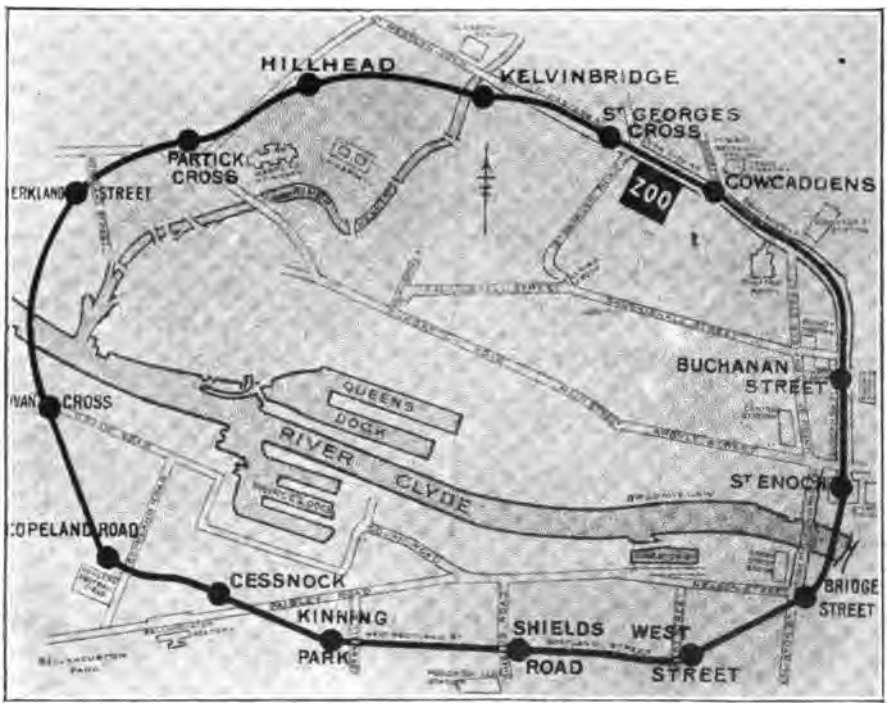
After London, Budapest was the first city to build a subway. Here it was the outcome of various plans for joining the central and business portion of the city with the park, a favorite rendezvous some two and one-half miles distant. Nothing definite was proposed until the spacious and handsome Andrassystrasse was laid out, which offered a direct and attractive route for a street railway. Application was made for permission to build a horse car line, but the plan met with strong opposition, chiefly upon æsthetic grounds. Several years later, after a short experimental electric line had proved a success, the scheme was again resurrected, electricity being the motive power. This proposal met a fate similar to its predecessors and led to the construction of the subway. In 1894 the concession was granted, and two years later

BUDAPEST SUBWAY, ANDRASSYSTRASSE.
(Showing method of construction and location.)

the line was opened to the public. No other project is at present being considered; the transportation problem is not so serious as elsewhere, and the tramway system is very efficient, giving satisfactory service.

THE GLASGOW SUBWAY.

The Glasgow subway was started several years before that in Budapest, but being much larger in scope and more difficult to



GLASGOW SUBWAY.

(Buchanan Street and St. Enoch stations are near the commercial and business centers. The areas reached by the road to the south-west, the west and north-west are residential quarters.)

construct, owing to the great amount of tunneling necessary, it was not opened until the latter part of 1896. Even then it did not remain open, for the traffic was so much heavier than anticipated that it was necessary to close the line for a few weeks and improve the facilities for handling crowds.

The first definite project for an underground road culminated in 1887, when a bill was introduced into Parliament to authorize

such an undertaking. The local authorities opposed it, because they feared that tunnels under the Clyde would render any further deepening of the river impossible and thus seriously interfere with the commercial development of the city. However, in 1890, a bill was passed; these objections did not seem of sufficient importance to counterbalance the need for rapid transit. Short sections of the steam roads, similiar to those in London, had been

THE BOSTON SUBWAY.

(The subway is indicated by the black line in the central portion of the map. Scollay square is at the western extremity of the island made by the two branches.)

operated for some time below the surface, but they reached only a few suburban districts. The new subway connects the business portions of the city with the residential areas to the west and northwest. Its eastern extremity is in the heart of the city, from whence the line makes a broad swing to the west, some seven miles in circumference.

As yet there seems to be no competition between the subway and the municipal street railways. The latter do not reach many of the suburbs served by the subway, and the long distance traffic does not use the surface lines because they are slower. Even with the proposed extensions, there will be abundant traffic for each system.

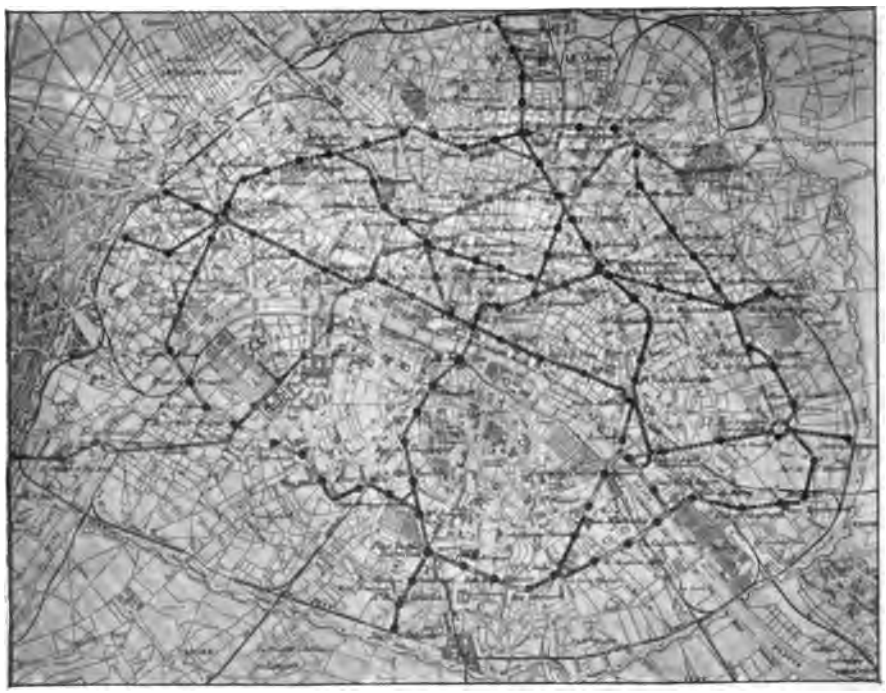
BOSTON'S SUBWAY.

The Boston subway was opened in 1898. It is entirely unlike every other line, not being a separate and distinct system, but merely affording to the surface lines a means of reaching the business districts without using the surface of the streets. Prior to its construction, the street car lines from the many suburban districts around Boston all met on Huntington avenue, Tremont and Boylston streets, or at Scollay square. Between Scollay square and the junction of Tremont and Boylston streets, the congestion was so great that traffic was almost wholly impeded during the busiest hours of the day. Various solutions of the problem were proposed from time to time. An elevated road was rejected by a popular vote, and the proposed widening of the streets involved so great an expense as to be impracticable. The only comprehensive scheme seemed to be a subway in the congested district, and in 1894 an act was passed authorizing its construction. The results have been most satisfactory. The streets are not nearly so crowded as before, and there is a great saving to the passengers of the time necessary to reach the central portion of the city from almost any suburb. The total length of the subway is $1\frac{2}{3}$ miles and contains over five miles of track. Several additional lines are under consideration.

SCOLLAY SQUARE, BOSTON.
(Congestion of traffic prior to construction of the subway)

THE COMPREHENSIVE SCHEME FOR PARIS.

The problem of rapid transit was first agitated in Paris almost half a century ago, and as early as 1870 the municipal authorities began seriously to study various solutions. In imitation of other cities, an elevated road was proposed during the eighties, but the æsthetic Parisian would have none of it. The beautiful boulevards, streets and public places, laid out by Baron Haussmann at



Courtesy of Le Genie Civil.

THE PARIS SUBWAYS.

(The subways are indicated by the dark lines. The map includes not only the portions already constructed but all approved by the central government.

great expense, must be preserved at every cost. And true to French custom no plan would be approved until a comprehensive scheme for the whole city was formulated. This had been accomplished by 1896, an electric subway having been decided upon. The street traffic had become so congested that no more surface lines or omnibus routes could be added.

The extent of the Paris metropolitan subway is indicated by the above map. When it is entirely completed, the system

will be nearly forty and one-half miles in length, will cost the city $36,000,000, and the operating company about $10,000,000 more for equipment.[1] At present, only one section and parts of two others have been completely constructed and put in operation, namely, the line running from the Vincennes gate in the east, past the Hôtel de Ville, the Louvre and the Tuileries, down the Champs Elysées to the Place de L'Etoile from which three lines radiate: one to the Trocadero, one to Porte Dauphine and one to Porte Maillot. The total length is some eight miles, and the cost about $7,000,000 for construction alone.

PORTION OF PARIS SUBWAY NOW IN OPERATION.

PUBLIC CONTROL IN GREAT BRITAIN.

The relation of the municipality to the subways varies greatly from city to city. In no instance have the city authorities undertaken operation; but in Paris and Boston, as in New York, the public owns the subway, having constructed it at public expense.

The extent of public control is least in Great Britain, there being a marked difference between street railways—surface lines—and underground roads. The former are subject to strict control, and the municipality may take over a line twenty-one years from the time when the franchise is granted, or may construct or purchase the tracks and rent them to a private company. But no underground road is municipally owned or operated, and no public authority has the right under the act granting the franchise to purchase a line. Of course the local authorities may regulate to a moderate degree, but beyond a somewhat restricted exercise of the police powers, they may not go. The most important provision

[1] The city has planned for two more sections, making eight in all, bringing the total length up to 48.5 miles and the cost up to between $45,000,000 and $50,000,000. These last two sections have not yet been authorized by the central government.

found in any of the acts, except clauses protecting avowedly private interests, such as are to be found in acts creating steam railroads using private property principally,[1] is one requiring workmen's trains to be run each day morning and evening at a fare not to exceed two cents for the whole or any part of the journey on the Central London Railway. Of course Parliament knows no higher law than its own will and may impose any restrictions or may order compulsory purchase at any price, but all such proceedings are without the realm of probability.

STATION ENTRANCE AT SCOLLAY SQUARE.

(This view shows not only how the streets have been cleared, but also the artistic character of the stations.)

This difference between underground and tramway lines rather surprises one at first, for British cities have gone as far in the direction of municipal socialism as those of almost any other country. The explanation is a very important fact, viz., that municipalization in Great Britain is not so much an economic movement as the expression of the desire that the local governments keep control of the streets. The underground roads, in so far as they cross or pass under the streets and public places, are using public

[1] The restrictions imposed upon private companies relate principally to the amount of capital that may be issued, the extent to which loans may be negotiated, location of the road, the property purchased, the indemnities paid, the maximum fares charged, the number of trains run, the motive power used, etc., etc.

property, to which the public authorities have as clear a title as that of a private individual to the ground under his house. The law knows no limit either above or below the surface. Yet no demand has been made upon the underground lines for payment or for the reservation of the right to take over the line. It is to be borne in mind, however, that the underground roads, especially those constructed since the movement for municipalization became strong, are some distance below the surface,[1] that their construction and operation necessitates very little disturbance of the street surface, and that instead of increasing the traffic, they relieve it. Further, they do not promise to be exceedingly remunerative, and without public aid either through subsidies or free grants to use the ground below the surface of the streets, many of them would not have been built. Both London and Glasgow have recognized these facts and have

BUDAPEST SUBWAY STATIONS, NEAR THE PARK.

GISELLAPLATZ STATIONS, BUDAPEST.

[1] The average depth of the Glasgow subway is 29 feet and the Central London Railway is everywhere, except at the western terminus which is on private property, at least 30 feet below the surface of the streets. Only the Metropolitan and the Metropolitan District Company are near the surface and have open subways. These are the steam roads which got their powers years ago.

not opposed the companies when they have appealed to Parliament for power to use the ground below the streets.

FRANCHISE IN BUDAPEST.

The nearest approach to British conditions is to be found in Budapest. There the city has invested nothing; the subway has been built, equipped and operated by a private company. But the city has reserved the privilege of taking over the line in 1940 when the concessions for the surface lines expire, provided announcement is made of its intention two years previous. Otherwise the franchise runs ninety years from 1896 or until 1986. The maximum fare is fixed at ten kreutzers (5 cents) during the first fifteen years, after which the city authorities may require a reduction. The city will receive from the gross revenues an amount to be calculated on the following scale:

During the first 10 years following a period of 20 years,							1916–26 1%
"	second	"	"	"	"	"	1926–36 2%
"	third	"	"	"	"	"	1936–46 3%
"	fourth	"	"	"	"	"	1946–56 4%

from this time to the end of the concession, 1956–1986, 5%. During the first twenty-five years, the city cannot grant any other concession for the establishment of a system of transportation of any kind between the center of the city and the Park. And for the first fifteen years, the company is exempt from taxation. The city of course possesses in addition the usual police powers, and the concession contains many provisions specifying how the subway was to be built and how it is to be operated.

TERMS OF THE PARIS CONCESSION.

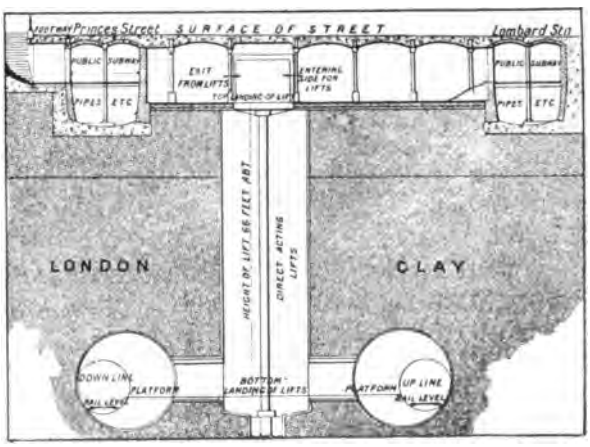
The position of the Paris subway is the result of many compromises between the municipal council and the central government, whose approval was necessary for the execution of the project. The central authorities insisted that the subway be connected with the railroads in order that trains from the country might be run right through to the center of the city and a suburban traffic thus developed. The municipality feared that the railroad companies would get control of the subway and that a large portion of the population would be induced to leave the city and live in the suburbs, thereby decreasing the city's revenue from octroi. A compromise was finally effected, and in the early

part of 1898 the act was passed, which fixed the gauge of the road, over which there had been so much dispute, at the standard width. But the city in order to prevent the railroads from ever sending their cars over the subway, has built the tunnels so narrow that only those cars can be used that are especially constructed for the subway.

Courtesy of the Tramway and Railway World.

EXTERIOR OF STATION ON THE CENTRAL LONDON ROAD.

Another point upon which the municipal council and the central government did not agree was as to who should operate the lines. The council wished not only to own but to operate the road. The central authorities objected, but finally compromised upon municipal ownership and private operation. This plan offers many advantages. According to a general law passed in 1842, a private company gets a franchise for seventy-five years if it builds a railroad; but if a public authority constructs a line, it may shorten the period to thirty-five years. Further, under private ownership, a company would find considerable difficulty in raising sufficient capital to build and operate the whole system.



Courtesy of the Tramway and Railway World.

LOCATION OF ROAD AT THE BANK OF ENGLAND.

Paris could borrow the money easily, and not only easily but at a lower rate of interest than a private company. This saving would be no small factor and will enable the road to lower fares ultimately.

The contract between the municipality and the operating company is most interesting. The franchise runs for thirty-five years, but at any time within seven years from date of construction the city may acquire the lines. The company agrees to maintain the highest degree of efficiency, to give to its employees an annual vacation of ten days with full salary, to give them full pay during military instruction and sickness, to insure them against accident, and to pay to the city two cents for every first-class ticket and one cent for every second-class ticket sold, with the added provision that when the annual passenger traffic exceeds 140,000,000 persons, this sum shall be increased, reaching at the highest figure 2.1 cents for each first-class and 1.1 cents for each second-class ticket. As the concession fixes the rate for a first-class ticket at five cents and for a second-class ticket at three cents, and for school children with teacher at a uniform rate of one cent, about one third of the entire receipts will go to the municipality and two-thirds to the company. As the cost will be about $35,000,000 for the lines thus far authorized, an annual revenue of $1,100,000 will be necessary to pay the interest, sinking fund charges and

Courtesy of the Street Railway Journal.

PARIS SUBWAY STATION.

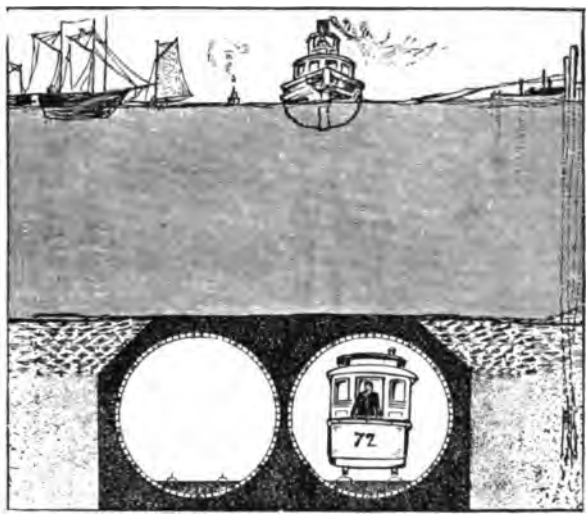
PARK STREET STATION, BOSTON.

incidental expenses; operating expenses are paid by the company leasing the subway. Thus, if the entire system should carry only 125,000,000 passengers annually, the city would more than pay all expenses. As this is considered to be a very low estimate and as it seems almost certain that the traffic will far exceed this number, the city will probably find the subway a paying investment. The roads in London, Berlin and New York carry nearly 5,000,000 passengers per mile per year; the Paris subway ought easily to reach the necessary 3,000,000 per mile per year.

The entire system of subways is not to be constructed at once, but is divided into six sections (two more have not been approved by the central government), which are to be opened from time to time as specified in the act, until by 1916 every line will be in operation. All are to bk . . present leasing company and upon

Courtesy of the Tramway and Railway World.

STATION ON CENTRAL LONDON RAILWAY.



PROPOSED SUBWAY UNDER EAST RIVER TO BROOKLYN.

the same terms as given above. The thirty-five year period—the duration of the franchise—is to run from the date of opening each line, and to prevent any inconvenience which might arise from franchises for different sections falling in at different dates, the concession provides that the company may retain possession of all until the termination of the last franchise, and shall pay 45,000 francs per kilometer per year ($14,000 per mile) for every line whose lease expires previous to that time.

CONDITIONS IN BOSTON LEASE.

Like Paris, Boston owns its subway, and has rented it for twenty years to a private company—the West End Elevated Railway Company, which has sub-leased it to the Boston Elevated Railway Company. The rental will never be less than four and seven-eights per cent of the cost of the subway, and if this sum does not amount to five

Courtesy of the Electrical World and Engineer.

CENTRAL LONDON TUNNEL.

cents for each car using the subway, it shall be made up to this sum. The income will pay the interest on all outstanding bonds and provide a sinking fund to extinguish them at maturity—forty years hence. All operating expenses are paid by the operating company, and at the expiration of the lease, the city will pay the fair value of all rails, pipes, wires, etc., which are affixed to the subway.

BOSTON SUBWAY.
(Showing method of avoiding grade crossings.)

COMPENSATION.

Comparing the various methods of securing compensation, it is evident that in no instance have large profits been secured. Budapest undoubtedly receives the most, considering the fact that it has invested nothing, for even the expense of rearranging sewers, water mains, conduits, etc., was borne by the subway company. Paris may make the most, for if the traffic greatly exceeds 125,000,000 persons annually, the *net* profit will be more than five per

Courtesy of the Street Railway Journal.
PARIS SUBWAY TUNNEL.

cent of the gross receipts, as the rate is about thirty-three per cent of the gross receipts. However, if the traffic should fall considerably below this figure, the municipality will need to make up the deficit from other sources. There seems to be little risk in this direction, and Paris has followed its usual course of exacting large payments from municipal monopolies rather than of requiring lower prices and increasingly better service. London and Glasgow are at the other extreme, and New York and Boston are not far distant, for the payments are not large, barely exceeding for the present the interest on bonds issued for the construction of the subways and sinking fund charges to wipe out the debt.

Considerable variety exists also as to the basis for compensation. Budapest uses gross receipts—an easily ascertainable basis and freed from much adverse criticism by the requirement that the rate increase as the years pass, or in other words, as the road becomes more remunerative. Paris has adopted an even simpler basis, receiving a certain fixed sum for each ticket sold. An attempt has also been made to vary the amount with the traffic but not quite so successfully as in Budapest. In Boston and New York, the cost of construction is used as a basis, and the payment to the city is a fixed sum no matter what the profit or the loss to the private company, or the size of the traffic.

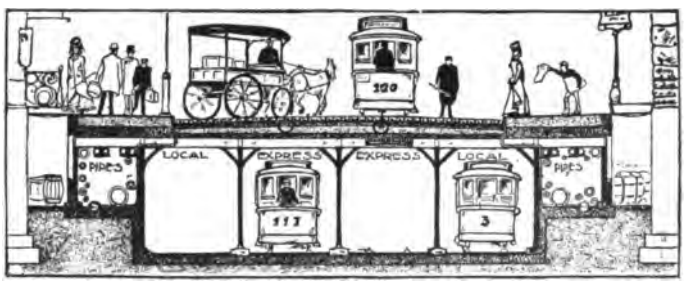
MOTIVE POWERS.

An examination of the roads themselves revels a great difference between those recently constructed and the underground lines in London built many years ago. Steam, as a motive power, has given way to electricity. Every London line constructed since 1890—the date when the City and South London road was opened—has adopted the third-rail electric system, as have also Paris and New York. The Budapest and Boston subways use the overhead trolley. Glasgow clings to cable traction which is largely accounted for by the conservatism of the Scotch and the fact that in 1890, when work was begun on the subway, electricity had not yet clearly demonstrated its efficiency. Cable traction was much cheaper, and upon the steep grades the car going down will help to pull up the car going in the opposite direction. The act of Parliament imposes no conditions except that steam can not be used. The Glasgow subway is unique in that it is the only underground cable railway for passengers in the world. Thus far it has worked very well.

TRAVEL A PLEASURE.

All the modern subways, even that of Glasgow, have adopted electric lighting, and the cars and tunnels are in marked contrast to those of the steam lines in London, which are dimly lighted, dirty and forbidding. Glazed tiles have generally been used, especially at the stations, and in every way the comfort and pleasure of the passengers have been ministered to. The entrances in Boston and Budapest particularly, are very artistic, and instead of being repellant because of their dirt and ugliness even add to the beauty of the streets and public places in which they are located. The London electric lines, being situated many feet below the level of the streets, have provided spacious elevators which counteract the disadvantages of deep level travel. The Paris, Budapest and Boston subways do not need them, being located near the surface of the streets. The Glasgow company has one, in Kelvinbridge, where the road is 115 feet below the crest of the hill, and New York will have a few where the road is far below the surface.

BOSTON SUBWAY.
(Showing method of construction.)



CROSS SECTION OF NEW YORK SUBWAY IN ELM STREET.

In the construction of the subways, much the same plans have been followed everywhere. Where the road level is near the street level, an open ditch was made, steel framework inserted and the street pavement replaced. Where this was impracticable, tunnels were driven; and in a few instances short viaducts were erected. The Budapest subway is everywhere just below the street level, and consists of two parallel lines at the same level, separated only by steel pillars, station platforms or thin walls. The Paris subway likewise consists of two parallel lines and always at the same level except where one section crosses another and a dip is made to avoid crossing at grade. Some of the distance, the lines run side by side, in a single tunnel; in other portions each line has a separate tunnel, uniting only at stations. The Glasgow road consists of two distinct tunnels throughout, except at stations, as is true of nearly all the London electric lines except the Waterloo and City road which has only one line almost all the way. The Boston subway has from two to four lines, usually at the same level, except where it is necessary to raise or lower one to avoid grade crossings. The New York line is the only one that has tracks for the special purpose of

Courtesy of the Electrical World and Engineer.

CENTRAL LONDON TRAIN.

GLASGOW SUBWAY—STATION AND TRAIN.

running express trains; and with the Central London road is unique in raising its stations above the level of the road. Each train on its departure thus is accelerated by the force of gravity, and as it approaches, is checked by the same force. This will greatly increase the rate of speed by reducing the time required for stopping and starting.

Courtesy of La Genie Civil.

CARS USED IN PARIS SUBWAY.

Most of the modern subways are adopting the American style of car, with an entrance at each end, in place of the old style compartment coach. Even the London roads are making the change and the Glasgow line introduced them at the start. The Paris car is a hybrid, having two doors on each side, one set being used for entrance and the other for exit. The train idea seems also to be spreading, as being more economical and better adapted to handling large crowds.

Courtesy of the Electrical World and Engineer.

CENTRAL LONDON CAR—MODERN EQUIPMENT.

There is one marked difference between foreign and American lines. Most of the former have first- and second-class compartments or cars; the latter charge the same fare for everyone. The Glasgow subway maintains only one service,

and the tendency elsewhere is in this direction. Some London roads have already made the change.

The uniform fare regardless of distance is also more common with us than abroad. In Paris and Budapest it is in vogue, but the lines are so short as to render a graded system unnecessary. The Glasgow company intended to adopt it, but as the cars run continuously around the circle, one would be able to ride indefinitely for one fare. To prevent this, a zone system was adopted. A penny ticket (2 cents) allows one to go as far as the fourth station from where he enters the car, or about one- and one-half miles—one-fourth the circumference of the road. A two-penny ticket (4 cents) entitles one to travel any distance, but not more than once around the circle. A ticket is given each passenger, which he gives up upon leaving the station at his destination. Any one who has ridden farther than his ticket indicates is thus found out and required to pay.

Courtesy of the Tramway and Railway World.
GLASGOW SUBWAY CAR.

That the subways of London, Paris, Budapest, Glasgow and Boston were needed and are performing a useful social service is shown by the large number of passengers carried. Their influence can only partially be estimated, but undoubtedly the effect upon social conditions, especially housing and overcrowding, is considerable, not to mention the saving of time in going to and from work. Doubtless rapid transit will not solve either the housing problem or transform our cities into utopias, but it will alleviate social conditions and prevent what otherwise would be unbearable evils.

LONDON GOVERNMENT REORGANIZED:

By Percy W. L. Ashley.

The London Government Act of 1899, which comes into force in November of the present year, is the most recent effort made for the reorganization of London administration. To understand its position in this movement and its actual value, a brief survey of the administrative history of London is necessary.

ADMINISTRATIVE CHOAS.

The Municipal Corporations Act of 1835, which organized the present municipal system of England, did not touch London, and no attempt was made to deal with the government of the metropolis before 1855. At that date the condition of affairs was most chaotic. In the centre was the area of the City of London—about one square mile in extent—with its Lord Mayor and Corporation, and a form of government which had scarcely changed during four hundred years. Outside this was a broad belt of districts which had grown up with little regard for one another, and in which the different administrative bodies had been created (generally by a special act of Parliament) at various times, as need arose. These were based on no general principle, and had induced a state of the utmost administrative chaos.

ATTEMPTS AT REORGANIZATION.

The work of reform began with the Metropolis Management Act of 1855. This act practically formed the Metropolis for the first time, defining it as the area contained by the City of London and a certain number of parishes, specified in the act. The city was untouched; the parishes were divided into two classes. The ratepayers of each parish elected a vestry, of which the membership varied in number. In the first class of parishes, this vestry had power to deal with roads, lighting, sanitation, etc. The vestries of the second class were grouped into fifteen districts, each

administered by a board elected by the vestries of the district. At the head of the whole system was placed the Metropolitan Board of Works, elected by the vestries and district boards, and not directly by the ratepayers. It had control of main drainage, street improvements, etc., and later of parks, bridges, fire-brigades and similar matters, and received powers as to artisans' dwellings. Some changes of detail were subsequently made, but none of any importance before 1888. By that time the board of works, although it had unquestionably rendered very valuable service to London and had carried out many important improvements, had fallen into discredit. Its constitution was unpopular, and shortly before 1888 an exhaustive inquiry had revealed considerable corruption, if not among members, certainly among officials. The Local Government Act of 1888, abolished the board, and transferred its powers to a new central authority, the London County Council, invested with far wider functions, and directly elected by the ratepayers (taxpayers).

In the subordinate authorities meanwhile, few changes had been made, and there was the greatest confusion, chiefly owing to the extent to which the system of so-called "*ad hoc*" bodies (*i. e.*, bodies existent for one sole function) had been carried. Thus there were the vestries and district boards, which dealt with the maintenance, watering and lighting of streets, the enforcement of the acts concerning public health and the adulteration of food and drugs. They might establish baths and libraries, but in that case they handed over the control to special commissioners. The assessment and collection of rates (taxes), and the preparation of juror and voting lists were duties belonging to other authorities called variously overseers, governors, or directors of the poor. The poor laws throughout London were administered by thirty boards of guardians, whose areas might include any number of parishes. Finally, there were certain central bodies, besides the county council: the London school board, the metropolitan asylum board, the conservancies of the two rivers, and the commissioners of police, these last being controlled by the Home Office—a department of the central government.

This was the position of affairs until last year (1899). Slight changes had been made in the composition of the vestries and district boards; the ex-officio chairmanship of the rector of the parish had been abolished, the franchise extended, and the vestries

authorized to take to themselves the duties of the commissioners of baths, libraries or burial grounds. But no really organic change had been made, and in 1899, London was administered by some five hundred public authorities, with a total membership of nearly ten thousand. The disadvantages of such a system, the confusion and inevitable lack of uniformity in administration are obvious.

AMALGAMATION OF LOCAL AUTHORITIES.

The new act is the result of a general movement in favor of reform. The vestries were unsatisfactory, some new grouping seemed essential. The real question at issue was as to the size and functions of these new groups. It was possible to set up a small number of powerful municipalities, which would have given London something of the administrative aspect of Berlin, and thereby to reduce the authority of the county council; or it was possible to extend the authority of the council, and make the vestries, or local councils, the agents of the council, so making London into something like the municipality of Paris. The act, however, has taken a middle course. Its authors were at first suspected of hostility to the county council, whose ten years' work had begun to create something like a municipal feeling in London, and the bill as originally introduced had grave faults. A policy of amendment instead of opposition was, however, finally adopted, and was fully justified by the results obtained.

The new act is a very useful piece of legislation, if only because it clears the way for future reforms, for it is essentially a great measure of simplification. The boards of guardians are to remain untouched, but all the rest of the host of local authorities are swept away, and are replaced by twenty eight municipalities. Of these, fifteen are former parishes; the remainder groups of parishes. The result is of course a great concentration of powers; all the functions of these abolished authorities (overseers, bath and library commissioners, burial boards, etc.), are transferred to the new municipal councils. Each of these will consist of a mayor, a number of aldermen and councillors. The aldermen are never to be more than one-sixth of the number of councillors: councillors and aldermen together are never to number more than seventy. This means of course a great reduction in the number of persons engaged in the government of London (many of the old vestries contained 120 members)—a change which

should be beneficial, as it will allow for an elaborate weeding-out process amongst the present administrators, should the electors care to use the opportunity. The aldermen are to be elected by the council itself (from within or without the council), and for six years. Partial renewal of the councillors every year, or total renewal every third year, is optional; probably the latter alternative will be chosen by most councils, following the example recently set by the boards of guardians. One change in composition, as compared with the old vestries, is that women are no longer eligible for election.

FUNCTIONS OF THE NEW COUNCILS.

The powers of the new councils have already been suggested. They will have all the work of the various authorities which they replace, together with a few not very important powers transferred from the county council.

Other transfers of power, from or to the county council, may be made by agreement between that body and a majority of the municipal councils, subject to the approval of the Local Government Board. The new councils will also have power to promote bills in Parliament, and to oppose them before parliamentary committees. England has not yet reached the stage of administrative development where the approval of a superior local authority is *alone* required, and where a considerable portion of the time of Parliament is not taken up by innumerable local acts.[1]

In matters of finance the new councils, like the old vestries, will have to go to the county council for authority to raise loans, and probably will continue to borrow the money from the council. One useful change is the abolition of elected auditors, and their replacement by the official auditors of the local government board.

In spite of the grouping of parishes, the areas and populations of the new muncipalities will still vary greatly. They range from 9,000 acres (Wandsworth) to 400 (Holborn), from 336,000 inhabitants (Islington) to 50,000 (Stoke Newington). The most important will certainly be Westminster, which with an area including so many important royal and government buildings, a population of nearly 200,000, and rateable value of nearly £5,000,000, will be

[1 The American reader must not misinterpret this sentence. Parliament does devote considerable time to local acts, but as compared with nearly every American State, it may be said to enact very, very little special legislation.—Editor.]

a dangerous rival in dignity to the old City of London, with which it can vie also in historical traditions.

MERITS AND DEMERITS.

Such briefly is the general effect of the new act. Its great merit and importance is that it much simplifies matters, reduces the number of local authorities and administrators, and concentrates power. In this it has followed the general trend of local government upon the Continent, *i. e.*, the abolition of "*ad hoc*" bodies, or their continued existence only as closely controlled agents of the municipal council. It is to be regretted that this concentration was not carried further. The administration of the poor-law should be either carried on by the municipal council itself, or, if still left to a special body, supervised and controlled by the council. This would only be following the example of the Prussian municipalities, for instance, from which in poor-law matters a good deal can be learned.

Another demerit of the new act is that the control of the local authorities by the county council is not strengthened. The control exists in some measure—in some financial matters, as already mentioned, and in matters connected with sanitation and the housing acts. But as the central authority for the whole of London, the county council should have very full powers to secure uniformity of administration and consistent action in all matters of general importance, and especially in all matters which affect health.

Lastly, the old City of London remains untouched, and still stands apart from the awakening municipal life of the rest of London. If it could be brought into line with the other municipalities, it might still assert its claim, as the senior of them all, to be the traditional representative of London. At present it represents nothing, and remains for some more vigorous ministry to reform.

Much has still to be done to make London the well governed city which it should and can be; but the lesson appears to have been learned at last that very much depends on the machine which is to be employed. The great difficulty in London administration of recent years has been the imperfection of the tools. With the recent improvements in these, we are perhaps justified in expecting more satisfactory results.

WATER SUPPLY OF GREATER NEW YORK.

By M. N. Baker.

The proposal of the Ramapo Water Co.,[1] about a year ago, to furnish New York with an additional water supply of 200,000,000 gallons a day from the Catskill region, delivered at the city line under a vaguely defined pressure, at the rate of $70 per million gallons, has resulted in two magnificent studies and reports on the water supply of Greater New York.[2] Both reports are full of valuable information and suggestions for other cities, as well as the one directly concerned. While each report establishes most completely the inadvisability and folly, to put it mildly, of the proposed contract, from the standpoint of the city, the vast problems involved in securing and maintaining a pure and ample water supply for the largest city in America make these reports of national interest and importance.

The earlier of the two investigations was made by Mr. John R. Freeman, of Providence, R. I., who was engaged for the purpose by Comptroller Bird S. Coler, to whom the city is indebted for having blocked the Ramapo scheme at the outset. The temporary delay thus secured afforded an opportunity for the Merchants' Association of New York to look into the question. This public-spirited body soon decided that the interests of taxpayers and good citizens generally required an exhaustive investigation, not only of the proposed contract, but of the whole water supply question. The Association created a committee of twenty-one voluntary workers, divided into sub-committees on engineering,

[1] The March issue of Municipal Affairs, pp. 88–91, contains an account of the attempt to foist upon the city this most iniquitous contract.

[2] *An Inquiry into the Conditions Relating to the Water Supply of the City of New York*, by The Merchants' Association of New York. 8vo, 627 pp. Tables, diagrams and maps. New York, The Merchants' Association, $3.

Report upon New York's Water Supply with Particular Reference to the need of Procuring Additional Sources and their Probable Cost with Works Constructed under Municipal Ownership, made to Bird S. Coler, Comptroller, by John R. Freeman, Civil Engineer. 8vo, 587 pp. Tables, diagrams and maps.

municipal finance and public policy, legislation, and fire protection and insurance. These committees were provided with engineering, legal and clerical staffs, the engineering committee having some half dozen engineering experts and numerous assistants. Mr. Freeman had an office and a field staff at work for a number of months.

The conclusions stated in each report are appended to this article.

RÉSUMÉ OF CONCLUSIONS.

The two reports agree in condemning the proposed Ramapo contract and in urging the necessity for immediate steps towards securing an additional water supply. They also agree in the conclusion that steps should be taken to cut down the waste of water by the extended use of meters, but neither the committee nor Mr. Freeman consider that waste reduction will afford more than temporary relief. However, Mr. Freeman shows that as a pure question of engineering and business, unmixed with politics or expediency, only a small additional supply is needed, if only the waste were cut down to a proper figure; and Messrs. J. J. R. Croes and Foster Crowell, two of the experts employed by the engineering sub-committee, reach the same general conclusions, but go further than Mr. Freeman as to the possibility of restricting waste. In fact, Mr. Croes believes that the yearly addition of meters until the whole service is covered, and the gradual overhauling of leaky pipes until the underground leakage is greatly reduced, might make the Croton supply ample for old New York until 1950. This hopeful view of the situation is not shared by the engineering sub-committee, nor the general committee of the Merchants' Association. Each report recommends that the proposed new supply be a large one. Mr. Freeman would develop a supply capable of furnishing 150,000,000 gallons a day at the start and at least 500,000,000 gallons ultimately, preferably 750,000,000 gallons. The Merchants' Association committee recommends the Adirondack region, which is capable of furnishing 1,500,000,000 gallons daily. The two reports agree as to the desirability of filtering both the present and new supplies, but while Mr. Freeman suggests filtration for the future, after cutting down waste, the engineering sub-committee has included filtration in all its estimates for a new supply (except the Upper Hudson) and advises the filtration of the present supplies, from surface sources, as early as possible.

SOURCES OF NEW SUPPLIES.

The greatest diversity in the final conclusions of the reports is in the recommendations as to the source from which the new supply should be drawn. The source of supply choosen by Mr. Freeman is the Housatonic and Ten-Mile rivers, having a combined drainage area of 1,020 square miles and requiring a large storage reservoir and an aqueduct 36 miles long. A daily supply of 350,000,000 gallons, from this source could be developed at a cost of $46,600,000 for construction, and $1,917,000 for annual operating expenses, interest and maintenance (but no sinking fund allowance).[1] This is $15 per million gallons of water supplied. The estimate, however, provides for the filteration of only 150,000,000 of the 350,000,000 gallons per day, in accordance with Mr. Freeman's original plan. No pumping would be required and the water would be delivered at the city limits under a head equivalent to an elevation of 300 feet above the sea.

The Merchants' Association recommends either the Hudson river above Poughkeepsie, or the Upper Hudson, the supply at first to be 250,000,000 gallons in either case, or 100,000,000 gallons a day less than the basis of Mr. Freeman's estimate, just cited. The water from the Hudson at Poughkeepsie would be both pumped and filtered, after which it would flow to the city limits by gravity through an aqueduct 60 miles long, and under a final head of 260 feet. The drainage area available under this plan is 11,800 square miles and the supply is capable of great future extension. The estimated first cost of this scheme (for 250,000,000 gallons a day) is $36,880,000; the annual charges, $2,585,000, or $28.33 per million gallons. The alternative recommended by the committee is the unfiltered Upper Hudson, or Adirondack supply, from a huge reservoir on the Schroon river, having a drainage area of 518 square miles. An aqueduct no less than 203 miles long would be required for this scheme, but it would deliver water by gravity under a head of 310 feet. Its total first cost would be $71,727,000; annual charges, $2,727,000; cost per million gallons, $30.

Either of the two plans of the Merchants' Association, or the one by Mr. Freeman, is capable of extension to yield a much larger supply than named above. Estimates show that for either the

[1] I use here the figures taken from the Merchants' Association Report to render comparisons easy.

Upper or Lower Hudson, the development of 500,000,000 gallons a day would not diminish the unit cost, although increasing the cost of construction to $72,374,000 and $140,155,000, respectively, but 750,000,000 gallons a day could be secured under Mr. Freeman's Housatonic and Ten Mile-River plan for only $52,000,000 gross and $8 per million gallons, or $67,000,000 and $11.86, respectively, if the whole quantity were filtered.

THE RAMAPO CONTRACT A STEAL.

It is interesting to note that the present water-works system of old New York, including the Croton, Bronx and Byram supplies and the whole storage, pumping and distribution systems, had involved a capital outlay of $86,360,000, up to Dec. 31, 1898; and that the general committee of the Merchants' Association places the cost of water for 1898 at $29 per million gallons, delivered to consumers. It also estimates the cost of distribution at $10 per million gallons, leaving $19 as the figure to be compared with the $70 per million gallons proposed by the Ramapo contract. The latter figure, in turn, is also to be compared with the $8 to $30 of the various estimates based on the Freeman and Merchants' Association plans. By a computation which need not be repeated here, the general committee reaches the conclusion that *in the forty years of the proposed Ramapo contract, the city would lose* $195,000,000, as compared with full municipal ownership.

PRESENT WASTE ENORMOUS.

A few words must be devoted to the reasons why the committee rejects Mr. Freeman's plan for a new supply, after admitting its economic superiority to its own. The chief, if not the only reason is the legal and other complications that might arise over interstate water rights if the Housatonic were chosen, that stream having the lower part of its drainage area in Connecticut. Mr. Freeman foresaw these difficulties and allowed for them in his estimates by including what he thought would prove very tempting prices for Connecticut land and water rights. Certainly the low cost of Mr. Freeman's plan, from $8 to $15, according to quantity and other conditions, compared with some $30 for either of the Hudson sources, warrants careful consideration of and a supreme effort to overcome the obstacles in the way of the Housatonic plan, provided an immense new supply is to be

developed. This raises a question as to whether Mr. Freeman has been consistent in turning from the possibilities of waste restriction, so ably brought out in his report, to the development of such monumental new works as he proposes, and whether the engineering sub-committee and the general committee of the Merchants' Association might not have done well to give more credence to the conclusions and recommendations of their engineers, Messrs. Croes and Crowell, on the same subject.

Without going into details, it may be stated that Messrs. Freeman, Croes and Crowell, have each demonstrated most conclusively that fifty per cent or more of the water supply of Greater New York is wasted, utterly without benefit to anyone, and that the waste might be prevented if only every consumer were metered and the underground waste were stopped. Mr. Freeman's own conclusions as to the difference between ideal and actual conditions are best shown by the accompanying table prepared by him to show the amount of water needed, in addition to present supply, in 1910, 1920 and 1930, for the whole city:

Probable Future Daily Requirements for Additional Water Supply of New York under Ideal, Probably Attainable and Present Conditions.

Year.		Total all Boroughs.
1910..	Probable population	4,490,000
	Additional supply required with greatest waste restriction probably attainable. (Meters on one-half the domestic taps underground leak as much as at present.)	127,000,000
	Additional supply needed under present conditions	230,000,000
1920..	Probable population	5,530,000
	Additional supply probably required under ideal conditions of waste restriction	88,000,000
	Additional supply needed under best waste restriction probably attainable	302,000,000
	Additional supply needed under present conditions	503,000,000
1930..	Probable population	5,575,000
	Additional supply probably needed under ideal conditions of waste restriction	92,000,000
	Additional supply needed under best conditions practically obtainable	597,000,000
	Additional supply needed under present conditions	795,000,000

It will be noted that the additional supply of water needed thirty years hence, "under ideal conditions of waste restriction" is 92,000,000 gallons; "under best conditions practically obtainable," 597,000,000 gallons; "present conditions," 795,000,000 gallons. The question is, if it is possible to cut the needed additional supply from 795,000,000 to 597,000,000 gallons a day, may it not be feasible to go nearer the ideal of 92,000,000 gallons a day?

It is true, as Mr. Freeman suggests, that a too great reliance on waste prevention might result in disaster, through too long a postponement of the date for the introduction of a new supply. It is also true, as the engineering committee urges, that the per capita consumption of 103 gallons per day, in Greater New York, is lower than that of any other large American city. But is the fact that New York wastes relatively less than other American cities a valid reason for providing a huge additional supply, in advance of cutting off a portion of the waste, particularly when the waste equals the actual use? No city ever permanently curtailed the waste of water when a large, new supply, designed to meet the wants of the next twenty to forty years, was in full view.

Personally, I am strongly inclined to agree with Mr. Croes in urging that efforts should be concentrated on cutting off the present enormous waste before developing an additional supply, particularly in Manhattan and the Bronx. It is true that the officials of the city seem quite indifferent as to this waste, and that strong opposition to its curtailment through the use of meters would arise in certain interested quarters; but it ought to be pretty well known by this time that any solution of the water problem of Greater New York, founded on mere common sense and sound engineering and financial principles, will not be enthusiastically received and carried out by the present administration, a Ramapo or some other job being much more to its taste. If, then, strong efforts must be made to overcome official inertia before a well-conceived water supply scheme can be put into effect, why not direct every effort towards securing the adoption of the most logical and economical plan, instead of one based largely on expediency and extravagence?

WATER SUPPLIES LIMITED.

Mr. Freeman has made a fine scientific demonstration of the great waste of water in New York, and Messrs. Croes and Crowell have endorsed and supplemented Mr. Freeman's work. This is most valuable, for during the early years of the coming century no municipal problem will be more pressing than that of providing pure and ample water, and no more effective work can be done than the curtailment of waste. Pure water supplies are limited in quantity in the vicinity of large centers of population, and

sooner or later all large American cities will be obliged to resort to artificial means of water purification, as has been the case with most of the leading European cities. It is interesting but depressing to note that large American cities with the highest water consumption and waste are also notable for the very bad quality of their water supply, like Philadelphia and Allegheny, Pa. The former city is at last taking steps to purify its water, but only after years of struggle with promoters of the Ramapo sort, who came near carrying the day. One reason why Philadelphia delayed the securing of pure water so long, and why the promoters came so near getting a long term contract, was the great cost of building works large enough to purify the enormous quantities of water wasted. The per capita waste alone probably equals, if not exceeds, the combined per capita waste and use in Manhattan and the Bronx.[1] Philadelphia has very few water meters in use, and politicians and water company promoters have united in resisting their introduction or any other means of waste prevention. The ex-chief engineer of the water bureau, Mr. John C. Trautwine, Jr., made a vigorous struggle for the introduction of waste prevention before the installation of filtration plants. After showing, without avail, that filtration with no restriction of waste would cost millions of dollars for construction and large sums annually for operation he felt impelled to resign his position rather than be a party to the construction of purification works to treat 200 gallons or more per capita per day, when 100 gallons would include a large allowance for waste.

The application of the experience of Philadelphia to New York is this: If a vigorous fight is not made to keep down waste, the per capita allowance will increase gradually under present conditions, and with leaps and bounds whenever more water and higher pressure are provided, making it harder, year by year, to resist the attempts to put through Ramapo contracts, both because of the increased demands for water and the larger and larger cost of a supply developed and owned by the city. Or, if we assume that there is no danger of New York's losing the full control of the water supply that it has enjoyed for more than half a century, the

[1] The consumption in 1899, as given in the city reports for that year, with a correction for the over-estimated population given out in advance of the last census, was about 225 gallons per capita in Philadelphia, or over 100 gallons a day more than in Manhattan and the Bronx.

less that is done to keep down the waste, the greater will be the problem of furnishing pure water. We have already seen that both Mr. Freeman and the Merchants' Association advise filtration, differing only as to the time when it should be introduced. Evidently, the smaller the total quantity to be supplied, the sooner it will be feasible to filter water drawn from the present sources, without financial difficulty, and the more readily filtration may be applied to water from new sources of supply. Moreover, a combination of waste prevention and filtration has the further and great advantage of making it possible to utilize nearby sources of limited quantity, instead of going far afield to secure huge volumes of water at an expense of scores of millions. The present Long Island supply for Brooklyn, and the Croton supply for Manhattan, might readily be supplemented from adjacent drainage areas, if the waste was properly reduced, so as to suffice for some years to come. Then, when it were found necessary to add more water, the Hudson at Poughkeepsie, one of the two alternative plans recommended by the Merchants' Association, could be drawn upon, comparatively small pumping and filtration units being added from time to time. In this way, the total volume of water required is always kept at the lowest feasible point, at a great saving in capital and maintenance charges, and water of a better quality is provided. The fire pressure, also, is more easily maintained year after year, with moderate rather than heavy drafts for regular consumption.

FINANCIAL ADVANTAGES OF WASTE RESTRICTION.

One of the disadvantages of an additional supply from a remote source, is that it must be on a grand scale to keep the cost per unit down to a reasonable figure, owing to the large capital charges due to long aqueducts or supply mains. While 250,000,000 to 500,000,000 gallons a day may be developed at a relatively low figure per million gallons, it must be remembered: (1) These huge additions to the water supply of a city make it very difficult to continue existing measures for the restriction of waste, to say nothing of imposing new ones; thus a large new supply really hastens the date when still another addition will be needed. (2) Although the cost per unit of water may be low, the gross outlay required to secure hundreds of millions of gallons of water is immense, and swells the city's total indebtedness.

This raises a point which deserves more attention than it has yet received: The tendency to lose sight of all other municipal functions when the needs of one department or undertaking are being considered. A larger margin between available supply of and actual demand for water is not the only urgent municipal need of Greater New York. Even if the water debt were to be placed entirely outside the debt limit,[1] in accordance with the recommendation of the Merchants' Association, its existence would be considerd by bankers and brokers when bidding on city bonds, to be issued for other purposes. In cities where all indebtedness falls within the debt limit, it is, of course, even more important that the cost of each municipal improvement should be considered in its relation to the needs of other departments.

FILTRATION.

The subject of filtration should not be passed by without a word relating to the present growing tendency among engineers and sanitarions to urge filtration of all water from surface sources, as distinguished from wells and springs, the water from which has been subjected to natural filtration. As most large cities are dependent upon surface water for their supply, this means that in the future we may expect to see filtration the rule, rather than the exception, in America. Both of the reports under consideration are to be commended for being in accord with this sound engineering principle. The need for filtration is due to the increasing density of population and pollution from other sources, which make it increasingly difficult to secure a source of water supply not liable to occasional, if not constant, pollution. Water purification has been put on such a firm scientific basis, and may be carried out at so low a cost, as to leave no valid excuse for using water that is, or may become at any moment, a menace to health; or that is not pleasant to sight, taste and smell. Obviously, if water is to be purified, the source of supply need not be so remote as otherwise, since minor impurities, or even gross ones, if necessary, may be removed by purification. The nearer the source of supply is to the consumer, the less will be the expense for aqueducts. This is one of the advantages of taking water from the Hudson at Poughkeepsie, instead of from the Upper Hudson.

[1] Water bonds may be issued by New York City in excess of the 10 per cent debt limit, but thereafter bonds for no other purpose may be issued until there is a margin.

These two reports deserve hearty commendation as examples of thorough investigation which might be followed with advantage in other cities, either by or in behalf of city officials, like Mr. Freeman's report to Comptroller Coler, or by voluntary public-spirited organizations, like the work of the Merchants' Association. In each investigation, the highest class of expert talent was secured, and the results obtained will be of immense benefit to communities other than New York. Whether New York will profit by the wealth of information placed before it depends almost wholly upon the spirit shown by its citizens. A few of its high officials have grasped the importance and the significance of the water supply problem, and a small group of private citizens have bent their energies to kill one of the most gigantic schemes of municipal robbery ever dreamed of in the history of the world. The public press of the city has been wonderfully unanimous in condemning the scheme, but it needs to be equally persistent in urging that the recommendations of these two reports be put into effect, particularly the recommendation that immediate steps be taken to increase the margin between water supply and demand. However much persons may differ as the means to be employed, there is no question but that New York is in great danger of a water famine; and it should be equally evident to careful observers that most of the city officials seem far more inclined to encourage than to avert such a disaster, unless the danger can be removed by a contract with the Ramapo Water Co., a combination of bad economics, politics and engineering in the interests of private promoters rather than the health and wealth of citizens and taxpayers.

WATER SNAKES IN OTHER CITIES.

Finally, I wish to emphasize the fact that New York is not the only city which has been or now is confronted with a water-works proposition, swollen with extravagance and corruption. Philadelphia was in the toils of a "water snake," as it was called, for many years, and may see it again before the filtration contracts are let, if its good people are not on the alert. Jersey City drank vile water year after year, like Philadelphia, because its officials could see nothing in an honest solution of the water problem and public opinion was too strong to prevent the consummation of the schemes dearest to the hearts of promoters and politicians. Just

now St. Louis is face to face with a proposed contract for a new supply, the actual merits of which I do not propose to characterize further than to say that they are quite at variance with the traditions and past designs of its engineering department. The two main features common to such schemes are: (1) They do not involve a franchise for the distribution and sale of water to private consumers; (2) The proposed works are not designed by the city after careful consideration and then thrown open to public competition among contractors for their construction.

As to (1), it is realized that public sentiment will no longer tolerate full private ownership of water-works in large cities, particularly where municipal ownership has been tried; consequently the proposed contracts are restricted so as not to bring the contractor and private consumer into conflict.

The evils almost certain to be incident to (2) are: (A) The source of supply is selected because of the ease with which its control may be secured by the contractor, rather than its actual fitness for the city's needs; and (B) the absence of competition. In the case of a virtual monopoly in water, such as the Ramapo Co. has sought to build up through purchase of water rights and legislative restrictions thrust upon the city, there is no competition either as to source of supply or for the labor and material entering into the construction of the proposed works. In other words, the Ramapo promoters counted on cornering the available water supply of Greater New York and getting their own price therefor by shutting out all competition, and also figured on having no limitations to their profits on account of construction. The Philadelphia and Jersey City promoters made their calculations on exactly the same basis. It can be seen, therefore, that an honest man might favor the development of a new water supply for a large city under a contract involving the payment of a unit price for all water consumed, but if both honest and wise he would insist that the city prepare the plans and specifications in such a manner that the contract would be thrown open to the widest possible competition. If the bids were to be on only one source of supply, then, generally speaking, the city should secure control of that source through condemnation; if not, it should see to it that the source was not controlled by some water syndicate, for such control shuts out all competition for material and labor, as well as for the water itself.

MR. FREEMAN'S CONCLUSIONS.

BIRD S. COLER, *Comptroller*, PROVIDENCE, March 28, 1900.
Department of Finance,
New York City.

Sir: I have the honor to make the following report in reply to your oral request of August 24, 1899, * * * [Questions investigated.] * * *

CONCLUSIONS—STATED BRIEFLY.

First—Although the consumption will very soon be uncomfortably close to the safe limit, with prudent management and with moderate and practicable restriction of waste, *the Croton Watershed, supplemented as now by the Bronx and Byram watersheds, can furnish a safe and ample supply for the boroughs of Manhattan and the Bronx for five years to come; thus giving a short but adequate time in which to build works for an additional supply.*

Second—If the public is ready to consent to the complete introduction of domestic meters and if the administration will earnestly and skilfully undertake the saving of water-waste in schools and public buildings and will earnestly and skilfully make such investigation of the locality of the present pipe leakage, as is practicable by closing existing gates and measuring the night flow in various sections by simple means without expensive new appliances; and will then diligently seek and mend the worst of these leaks, at a very moderate total expense, then the safe limit of the present supplies could be extended to ten years hence, with present rate of growth.

One year is *a very* brief time for the necessary surveys—and five years an almost impossibly short time for building proper aqueducts and dams.

Third—The preliminary steps should immediately be taken toward the acquisition of an additional supply on a comprehensive scale, capable of supplying 150 million gallons at the start, and ultimately yielding at least 500 million gallons per 24 hours (preferably 750), and surveys, borings and river guagings, with analysis of water samples, by 20 or more field parties, over nearly all the grounds covered in the reconnaissance described in the following appendices, should be begun during the present summer so that construction may be begun, if possible, early in the spring of 1901 or not later than 1902.

While there is ample proof that more than half of the water now delivered by the New York and Brooklyn aqueducts is wasted, the total per capita consumption of water, including waste, in New York and Brooklyn, is to-day smaller than in Boston, Philadelphia, Washington, Buffalo, Albany, Pittsburgh, Chicago, Cleveland, Detroit, Denver, and certain other large American cities, and it appears plain from reasons given later, *that the hope of restricting waste does not justify delay in making sure of an adequate additional supply.*

Fourth—The work of the Water Department in the location and prevention of waste should be reorganized and carried on more skilfully and earnestly than heretofore. The city divided into districts, the statistics of average consumption and night consumption in bulk and per capita obtained and classified. The metered use better classified and the whole statistics published annually in such form that comparisons of economy can be easily and intelligently made.

Fifth—If, from legislative or other causes, there has to be delay in securing a moderate additional supply, then a thorough system of waste-prevention, beginning properly with a meter on every domestic service, *must, of necessity, be begun at once or danger of a water famine invited.*

Sixth—For the proper and reasonable protection of the entire city against fire and for the greater convenience and economy of the householders I would earnestly recommend that all new work in supply and distribution of water tend toward providing a pressure or head of 300 feet above sea level at the city limits (near Yonkers) for any new supply from the north, and (ultimately) a pressure of 100 pounds to the square inch above street level at the City Hall, and that requirements for plumbing and all pipe laying be carried forward with a view to the gradual increase of pressure toward this limit, reaching it, say, 15 or 20 years hence. Recent experience in Syracuse proves that such a change of pressure is entirely possible without great disturbance or inconvenience.

Seventh—I find the price proposed by the Ramapo Company exorbitant and that this source, while good in some ways, is less desirable, of smaller capacity and more expensive than other sources that can probably be obtained.

REPORT OF THE MERCHANTS' ASSOCIATION COMMITTEE ON WATER SUPPLY.[1]

To the Merchants' Association of New York:

GENTLEMEN: The Committee on Water Supply presents herewith its report.

The proposal of the Board of Public Improvements in August, 1899, to enter into a long-term contract with the Ramapo Water Company to furnish the city with water, called the earnest attention of the public to two important subjects.

First: The City's needs, immediate and future, for an additional supply of water.

Second: The best method of meeting these needs, both as to the sources of the supply and the manner in which it should be procured; that is, whether by private contract or municipal construction.

* * [Organization of Committee.] * *

PART I.

RELATIVE FINANCIAL RESULTS OF MUNICIPAL AND PRIVATE OWNERSHIP.

* * [Financial History of Water Supply.] * *

In other words, during the term of sixty-seven years, from January 1, 1832, to December 31, 1898, the City of New York made a capital investment of $86,359,562.09 for the construction of water works. It expended during that period for interest charges, maintenance and operation $66,544,245.38; the aggregate earnings were $88,017,329.72; the total net profits were $21,473,084.34.

The Committee reaches the following conclusions from the data analyzed:

1. The maximum cost of water per million gallons by the Croton System (obtained by dividing the total annual charge by the quantity delivered) was $54.20 in 1849.

2. The average cost per million gallons from 1866 to 1898, both inclusive, was $35.06. The data of consumption during some of the preceding years are lacking and the average cost cannot be accurately computed prior to 1866.

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[1] The members of this Committee were M. E. Bannin, *Chairman*, D. Le Roy Dresser, *Vice-Chairman*, A. J. Baldwin, R. R. Bowker, Thomas C. Clarke, Joseph G. Deane, Horace E. Deming, Dr. Cyrus Edson, Dr. George B. Fowler, Prof. F. J. Goodnow, H. W. Goodrich, Charles L. Guy, Col. H. S. Haines, Rudolph Hering, F. W. Hinrichs, W. C. Le Gendre, Dr. Milo R. Maltbie, W. A. Marble, Prof. R. Maye-Smith, E. P. North, E. E. Olcott, John M. Perry, Henry G. Prout, E. O. Richards, Jacob H. Schiff, Dr. Albert Shaw, J. R. Sheffield, D. McN. Stauffer, Simon Sterne, J. Kennedy Tod, Henry R. Towne, J. R. Van Wormer, R. W. G. Welling. S. Christy Mead, Frederick B. De Berard, Wm. R. Corwine and N. Flanter, were from the staff of the Merchants' Association.

8. The approximate average cost per million gallons in the year 1898 was $29.07, and in period 1898 to 1910 (the latest date when the present system and the works now being constructed will be able to supply the City with sufficient water even if recourse be had to meters and other means of reducing waste), it will be under $25.00 and probably in the neighborhood of $20.00, owing to the great relative decrease of outlay and increase of consumption during the next few years.

4. The annual cost of distributing water to consumers is not less than $10.00 per million gallons at present, and this expense should be added to the cost of delivering water at the city limits. The relative cost, therefore, to the City per million gallons by the proposed Ramapo contract, which fixes the price of water delivered at the northern limits of the city at $70.00, and by municipal ownership is approximately:

Contract Cost	$80.00		
Average City Cost, 1866-1898	35.06	Excess cost by contract	$44.94
Average City Cost, 1898-1910	25.00	Excess cost by contract	55.00
City Cost, 1898	29.07	Excess cost by contract	50.93

5. The city has received an average revenue of $52.87 per million gallons for all water supplied by the Croton system since 1865.

6. The Croton system had yielded up to the end of 1898 a net profit of $21,473,084. In the year 1898 it paid a net profit of $1,881,843. The ratio of profit is increasing rapidly and the annual net profit will probably exceed $4,000,000 by 1910.

7. The relative profit by municipal ownership and loss by the proposed Ramapo contract is:

CITY SYSTEM.

	1866–1898.	1898.
Average revenue per million gallons	$52.87	$50.29
Average cost per million gallons	35.06	29.07
Average profit	$17.81	$21.22

CONTRACT SYSTEM.

Average cost per million gallons	$80.00	$80.00
Average revenue per million gallons	52.87	50.29
Average loss	$27.13	$29.71

COMPARISON ON BASIS OF 1898.

Profit by City system	$1,881,843
Loss by proposed Ramapo contract	2,635,127
Total loss	$4,516,970

COMPARISON FOR PERIOD OF FORTY YEARS, 1906-1945.

POUGHKEEPSIE SYSTEM AND RAMAPO CONTRACT.

Net profit by City system	$48,338,259.55
Deficit under Ramapo contract	60,241,811.32
Cash loss	$108,580,070.87
Plus value of Poughkeepsie system, all bonds having been paid	$36,880,000.00
Cash and Property loss to City	$145,460,070.87
Estimated Cash and Property Loss on second system, constructed by 1920, capable of supplying 250,000,000 gallons daily additional	$50,000,000.00
Final Loss by the acceptance of Ramapo contract	$195,460,070.87

For the purpose of comparison of the relative financial advantage of municipal ownership and the proposed Ramapo contract we have made calculations of the cost under both systems, as shown in the table above; we have taken as a basis for the municipal supply the Poughkeepsie system as recommended by the engineers, the ultimate cost of which is $36,880,000 for a supply of 250,000,000 gallons daily. We have assumed that a plant capable of delivering 100,000 000 gallons daily, would be completed in 1906 at a total cost of $29,691,000; we have further assumed that in each of the years 1911, 1914 and 1917 a further supply of 50,000,000 gallons daily would be needed and have calculated the cost thereof, making the total cost in 1917 $36,880,000. We have allowed for interest at 3 per cent, for a sinking fund of 4 per cent, for depreciation and the cost of operation. We find that in 1937 the bonds issued for construction would have been paid.

In calculating the cost under the contract system with the Ramapo Company, we have assumed a payment by the City to that Company for the same amount of water as delivered under the municipal system.

Both estimates are based upon an increase of population at a rate justified by the increase in the last few years and a consumption relative to such increase; we have also estimated that the total annual City receipts would be, as at present, $50.29 per million gallons.

The results of these calculations are as follows:

First—By 1937 the City would own its plant under the municipal system free from all debt, and would own nothing under the Ramapo system.

Second—Between 1906 and 1917 the City, under municipal ownership, would have an annual deficit beginning with about $1,800,000 in 1906 and ending with about $104,000 in 1917, but that thereafter beginning in 1918, the City would commence to make a profit which in that year would be about $133,000 and would constantly increase year by year until 1945 (a date chosen because it is the termination of the proposed Ramapo contract), in which year it would be about $3,100,000. The excess of this profit over the deficit in the forty years of operation from 1906 to 1945 would be about $48,000,000, a sum which represents the cash profit to the City during that period under municipal ownership.

Third—Under the proposed contract the payment to the Ramapo Company of $70.00 per million gallons, less the revenue from consumers at $50.29 per million gallons, would result in a deficit to the City of over $60,000,000.

Fourth—If, therefore, the City should fail to build and operate its own water supply and should make a contract with the Ramapo Company it would suffer a loss of $108,000,000 in the forty years of operation.

Fifth—But that amount of $108,000,000 does not represent the total loss to the City, for it would own no plant under the Ramapo System, while, under the municipal ownership plan, it would have paid for its plant by 1937 and own it free of indebtedness thereafter. The total cash and property loss, therefore, would be $145,000,000 on a system supplying only 250 million gallons daily.

Sixth—Furthermore, by 1920, another system to meet the increasing needs of the City and to supply an additional 250 million gallons daily, must be constructed. During the twenty-five years of the operation of this new system a further loss of at least $50,000,000 to the City would result, compared with a contract with the Ramapo Company, for such additional supply at the proposed price. This makes the total loss to the City during forty years over $195,000,000.

Seventh—The operation of increasing the supply from the Hudson every fifteen or twenty years by an additional supply of 250,000,000 gallons daily, is a perfectly feasible plan, not only from an engineering, but most of all from a financial standpoint. The supplying of water to its citizens becomes an increasingly profitable enterprise, while on the other hand contracting with the Ramapo Company would probably result in giving that company the monopoly of all future additional supplies for the City of New York.

PART II.

THE PRESENT SUPPLY.

* * [Description of Present Supply.] * *

The year fixed above, 1908, as the date when the consumption will equal the supply, may be postponed if some of the waste can be lessened. This measure of precaution must be taken in order to save the boroughs from a water famine until a new and larger source of water supply can be obtained. The lessening of waste is, however, not merely a temporary expedient, but it will be a means of economy and security for the future. Modern hydraulic engineers and managers of water works are agreed that it is quite within the resources of engineering and administration to prevent a very considerable part of the waste. It is estimated by the engineers employed by the committee that the total daily waste is from 120,000,000 to 150,000,000 gallons daily, part of which is in houses, but the larger part of which is underground. A complete cure for the latter can be found by putting all water mains in subways, where they will be accessible for the detection and repair of leaks; and the leakage can be materially lessened by other methods, all of which, however, are costly and slow of development.

A well-administered meter service has been found efficacious in other cities in discovering leaks in the mains, as well as inside of buildings, and has led to the repair of both mains and the plumbing in houses, resulting in a marked diminution in the daily waste. The engineers estimate that a substantial saving (ten per cent) can be effected by the prevention of waste and the present supply thus made to last until the year 1910.

Attention is also called to that portion of the Engineering Committee's report relative to a possible use of salt water for street cleaning and other purposes; some saving of the supply might thus be effected.

We are thus brought to the conclusion that an additional supply for all the boroughs of the City is imperative, and that measures should be taken to furnish the additional supply at the earliest practicable moment. The Engineering Committee estimates that from six to seven and one-half years will be necessary from the inception of the work to the delivery of additional water. Your committee most strenuously urges that immediate steps be taken to furnish an adequate supply of water, to be available, at the latest, in 1910.

No words are necessary to convince the people of the City that one of the greatest calamities is an insufficient or impure supply of water.

PART III.

AVAILABLE SOURCES FOR ADDITIONAL SUPPLY.

Fortunately for the City of New York, abundant supplies of water can be obtained without any great engineering difficulties, and at a much less cost than the proposed Ramapo contract involves.

There are four great sources of supply which the committee has investigated: (1) On the east side of the Hudson River, the Housatonic and Ten-Mile River water-

shed; on the west side (2) the Wallkill River watershed; (3) the watershed of the Catskills, viz.: The Esopus, Catskill and Schoharie creeks; (4) the Hudson River itself.

The first two named, the Ten-Mile and Housatonic rivers, and the Wallkill River, are interstate rivers and have been eliminated from consideration by reason of certain legal difficulties set forth in the report of the Committee on Legislation.

The Esopus and Catskill creeks, the sources from which the Ramapo Company proposes to supply the City under its contract, will yield about 260 million gallons daily, and the entire Catskill watershed, which includes Schoharie creek, will yield about 460 million gallons per day. This is probably the limit of the Catskill system. The Hudson River system, however, is capable of extension to 1,500 million gallons per day at relatively small cost.

For a discussion of other possible sources of supply, reference should be made to the accompanying reports from the Engineering Committee.

PART IV.

HUDSON RIVER SUPPLY.

All the additional water that the City of New York is likely to need for many years to come, until its population shall increase to 18,000,000, can be obtained from the Hudson River, above Poughkeepsie. It is proposed to build pumping stations and filter beds on the east side of the river, an aqueduct from Poughkeepsie to the northern limits of this City, and a reservoir near the northern limits. The plant thus constructed would be capable of supplying 250,000,000 gallons daily, although it is not proposed to build a plant capable of delivering at first more than 100,000,000 gallons daily. The 250 million gallons a day, combined with the present supply, will meet the needs of the city for fifteen or twenty years to come. Thereafter increased pumping facilities at the same point, with additional aqueducts, will furnish an additional supply in any amount up to 1,500 million gallons daily. It is proposed to filter this water, the experience of other cities having shown that filtration is a perfect method of purifying water, being, indeed, only a scientific reproduction of a process of nature. That filtration is effective in removing impurities and germs of disease is amply proved by the experience of Albany, Poughkeepsie, London (England), Hamburg (Germany), and other cities. It has already been recommended by the Health Board of the City for the Croton water.

The watershed from which this supply may be drawn comprises all the streams flowing into the Hudson above Poughkeepsie, including the Adirondack region. The area of the watershed is approximately 11,800 square miles.

In order to prevent the water above Poughkeepsie from becoming brackish, by reason of taking so large amount of water from the river at that point, it is proposed to build in the Adirondacks compensating reservoirs, in which may be stored the freshet waters during the months of excessive rain. These waters are to be delivered into the river during the dry season, so that the flow of water may be kept even throughout the year.

Incidental benefits would be the improvement of the navigation of the upper waters of the Hudson, the prevention of floods and the provision of a uniform flow for the mill owners along the various streams.

That the project is entirely feasible, the report of the Engineering Committee leaves no doubt. It has already had examinations made for reservoirs at various points in the Adirondacks, and has shown that it is entirely practicable to obtain the necessary storage without excessive cost.

As an alternative proposition to the pumping of water from the Hudson at Poughkeepsie, the Engineering Committee suggests the taking of water from the Hudson at the junction of the Sacandagua about 80 miles above Albany, whence it may flow by gravity through longer aqueducts to the City limits. Both projects require the construction of storage reservoirs to equalize the seasonal flow.

The Poughkeepsie project is more advantageous in that the streams below Glens Falls furnish an additional supply.

* * [Sources compared in detail.] * *

PART V.

THE RAMAPO CONTRACT AND THE EXPERIENCE OF OTHER CITIES.

The Ramapo Water Company was organized in September, 1887, under an act which, with its amendments, permitted companies organized under it to supply with water any municipality in the State of New York. In 1890 the act was repealed and a general law enacted which surrounded with new safeguards contracts made with companies organized under it. These safeguards did not apply to the already organized Ramapo Company; and a few years later the Legislature extended to that company privileges greater than those possessed by any other water company in the State, far greater than the privileges of the City of New York. This was done under the guise of an act (Chapter 985, Laws of 1895) which purported to "limit and define the powers of the Ramapo Water Company." This act gives the Ramapo Company full power to contract to supply water not only to any municipality, but to any corporation, public or private, with no requirements such as other companies must meet, for filing an amended certificate, or obtaining the consent of the local authorities. The power to supply water for municipal purposes, and, in addition, to supply water for commercial use, given by this special act, is a power which no corporation can obtain except by special legislation, and is a power possessed only by the Ramapo Water Company. The company is also given broad powers of condemnation and may, without fear of opposition, select such route as it chooses; it is practically impossible for any one objecting to the route selected, within the time limit by the act, to comply with its provisions for making opposition to the condemnation proceedings, and, as an additional safeguard to the company, the expense of such opposition is made prohibitive. This is the method which the Legislature used to "limit and define the powers of the Ramapo Water Company."

While the Legislature has thus increased the powers of the Ramapo Company, it has very greatly restricted the power of the City to acquire its needful additional supplies of water. * * * * * *

The specific objections to the Ramapo contract are as follows:

First—The price is exorbitant.

Second—The contract is ambiguous as to the pressure at which the water is to be delivered at the City limits.

Third—The contract is ambiguous as to the respective duties and privileges of both contracting parties.

Fourth—The City will not own the plant at the termination of the contract.

Fifth—The effect of the contract will be to force the City hereafter always to purchase water from that company.

Sixth—It will deprive the City of large profits from a water supply owned by the City, or force it to raise the price of water, which would be injurious to its industrial interests.

Moreover, the experience of other municipalities in the United States, as well as in other countries, shows an almost continuous tendency to substitute publicly owned water systems for private, a tendency so persistent and so universal, and of such constantly increasing force, that the wisdom, in the public interest, of the policy of municipal ownership and control of water supply, would seem established by abundant experience. * * [Municipal operation in other countries.] * *

PART VI.

LEGISLATIVE AND CONSTITUTIONAL OBSTACLES TO THE CITY'S ACQUIRING THE NEEDED ADDITIONAL SUPPLY.

The principal argument urged in favor of entering into the proposed Ramapo contract is the City's lack of power, through legal difficulties, to supply its necessities. It is urged that the City has not the power to condemn and so to acquire the properties it needs. Our answer is that the Legislature should give the City of New York this power. It is almost the only city in the state which does not already have that power. Why Brooklyn should be prevented from using the waters of Suffolk County, and why the present Charter of the City should so markedly have limited the City's power, while the Legislature has increased the powers of the Ramapo Water Company, we do not care to inquire, but that these limitations should be removed, no citizen of New York not interested in a water company will dispute.

It is urged, also, that there are constitutional difficulties in the way. To this we answer that these difficulties are exaggerated, and so far as they exist they will be quickly removed when the people who make constitutions realize the character of the difficulties and their unseasonableness. When our cities were incurring a burden of debt beyond their ability to meet, there was put in our Constitution a restriction upon their debt-incurring capacity. No city was permitted to incur debt beyond ten per cent of its real estate assessed for taxation. Later, on account of the absolute need that our cities should have an abundant supply of pure water, and in order to prevent their falling into the power of private water companies, the Constitution was amended so that, even though cities had reached their debt limit for other purposes, they were allowed to go beyond it to obtain a supply of water. This was due to the general recognition of the wisdom of the policy of municipal ownership and control of the supply of water. If, however, the City's debt, including its debt for water supply, exceeds the ten per cent limit, no debts for other purposes than water-supply can be incurred until the assessed valuation shall permit.

It is upon this provision of the Constitution that reliance is placed to compel the City of New York to supply by private contract its great need for water.

The demonstrated wisdom of the policy of municipal ownership of water-supply, irrespective of the mere question of profit; the demonstrated great profit of that municipal policy in New York City, irrespective of any other question—these two factors, gaining in force every year in forming public opinion, are bound in a short time to compel the removal of the present constitutional bar.

We therefore believe that without waiting for any further constitutional amendment the City should at once take the necessary steps to provide for itself a supply of pure water ample for future needs. * * *

RECOMMENDATIONS.

The Committee therefore recommends as follows:

I. No contract whatever should be entered into with the Ramapo Water Company.

II. The policy of supplying New York City with water by contract should be opposed by all lawful means.

III. The Legislature should clothe New York City with power to acquire by condemnation any water rights needed for its public water supply, excepting water rights actually used by, or necessary for, the supply of any other city, town or village.

IV. The constitutional requirement that the bonds issued by New York City for a water supply shall be included in ascertaining whether the City can become indebted for other municipal purposes should be removed.

V. The Comptroller's quarterly and annual reports should contain a clear and businesslike statement of the financial status of the City's investment in its water works.

VI. A carefully devised system of detailed, accurate and easily understood public records and reports should be adopted by the Department of Water Supply.

VII. The financing by the City of any addition to its water supply should include the application of the surplus of the revenues over expenditures to the redemption of bonds issued to establish the plant.

VIII. Immediate steps should be taken by the City of New York to acquire an additional supply of 250 million gallons of water daily from the Adirondack Mountain watershed by either of the systems proposed in this report.

IX. Immediate steps should be taken by the City officials to prevent the waste of water.

COMMITTEE ON WATER SUPPLY,

M. E. BANNIN, *Chairman;*

S. C. MEAD, *Secretary.*

NEW YORK, August 8, 1900.

TAXATION OF FRANCHISES IN MASSACHUSETTS.

By James R. Carret.

The passage of the Ford bill by the legislature of the state of New York in 1899 was an attempt to tax the franchises or privileges granted to what may be called public service corporations.[1] The franchise which this law aimed to tax was not the right given by the state to be a corporation, but the right to use public property, the streets, highways, parks, *et cetera*, for a specific purpose. These two franchises should be clearly differentiated, for they are entirely different in theory, and the courts have applied to each different rules of law. It is the right to use public property—the "special franchise" as the New York law calls it—which concerns us here; but it is necessary to deal to some extent with the right to be a corporation, as taxation of this franchise has been used to reach "special franchises".

Massachusetts has had in force for thirty-five years a system of taxation of corporate franchises which includes not merely public service corporations but all corporations chartered by or organized under any law of the state for purposes of business or profit. A description of this system, its origin, its growth and its practical working may be of value to those in other states who are seeking to improve methods of taxation.

RAPID INCREASE OF CORPORATIONS.

At the end of the Revolutionary war, no corporations for purposes of business or profit existed in Massachusetts. But before the close of the century a good start had been made, as shown by the following list, which gives the dates when the first corporations were incorporated :

[1] See *The Ford Act: Taxation of Local Franchises* by John De Witt Warner, Municipal Affairs, June, 1899, p. 369.

KIND OF CORPORATION.	WHEN FIRST INCORPORATED.
Bank	February, 1784
Bridge corporation	March, 1785
Manufacturing corporation	February, 1789
Canal "	" 1792
Aqueduct "	" 1796
Turnpike "	June, 1796
Fire insurance "	March, 1798
Marine insurance "	February, 1799
Savings institution (or bank)	December, 1816
Gas-light company	January, 1828
Steam railroad corporation	June, 1830
Street railroad "	May, 1853

During a period of 25 years, beginning with the year 1784—the first complete year after the termination of the Revolutionary war—2,290 acts were passed by the legislature, of which 414 or 18 per cent were acts chartering or relating to corporations. In the first 7 years, 487 acts were passed, of which only 5 related to corporations. In the last 7 years, 928 acts were passed, of which 275 or 29.6 per cent affected such corporations.

It would doubtless be interesting to obtain the exact facts as to the amount of legislation relating to such corporations in the years following that period, but it is hardly necessary to do so to indicate the rapid development of the corporate idea and the great increase in the number of corporations in this state, as well as in other states, which is known to everyone. It should be noted, however, that this increase has been influenced not only by the growth of the community, but also by the greater ease in obtaining charters after the legislature, becoming tired of granting a special charter in each case, began to provide general laws for the voluntary formation of corporations. The first was passed in 1851.

The basis of the chief part of the Massachusetts system of taxation is the general property tax, that is, the idea that everything which is called "property" should be taxed. The constitution of 1780 gave the legislature

full power and authority * * to impose and levy proportional and reasonable assessments, rates, and taxes, upon all the inhabitants of, and persons resident, and estates lying within the said Commonwealth; and also to impose and levy reasonable duties and excises upon any produce, goods, wares, merchandise, and commodities, whatsoever, brought into, produced, manufactured, or being within the same. (Part 2, ch. 1, § 1, art. 4.)

The laws of taxation in Massachusetts follow the familiar legal division of property into real and personal. Real estate is construed for purposes of taxation "to include all lands within this

state and all buildings and other things erected on or affixed to the same",[1] and is taxed, of course, in the city or town where it lies. Personal estate for purposes of taxation includes, *inter alia*, "all goods, chattels, money and effects wheresoever they may be, * * public stocks and securities, stocks in turnpikes, bridges and monied corporations within or without the state."[2]

In contemplation of law, personal property follows the owner and the laws of taxation conform to that rule in providing that all personal estate shall be taxed in the place where the owner resides. To this rule, however, some marked exceptions were made early in the century, one of which was:

All machinery employed in any branch of manufactures and belonging to any corporation, shall be assessed to such corporation, in the town or other place where such machinery may be situated or employed; and in assessing the stockholders for their shares in any manufacturing corporation, there shall first be deducted from the value thereof the value of the machinery and real estate belonging to such corporation.[3]

Besides these general provisions, every bank was subjected to a special tax of one-half of one per cent, payable semi-annually within ten days after the first Monday of April and the first Monday of October, on the amount of its capital stock actually paid in.[4] The first act imposing such a tax was chapter 32 of the Acts of 1812, which required every bank to pay a tax of .5 per cent on its amount of capital stock paid in, within ten days after each and every semi-annual dividend made after a certain date, and was held constitutional in Portland Bank *v.* Apthorp, 12 Mass., 252. In this decision the court declared the tax to be an excise upon the privilege granted to the plaintiff under its charter from the state, or in modern terminology, a tax upon its franchise, which was held to come within the term "commodities" used in the constitution.

Such were the provisions of the Revised Statutes of 1836, the first codification of the general laws of Massachusetts. Prior to the Revised Statutes, there appears to have been no standing law defining the property upon which taxes should be assessed. The provisions for that purpose were apparently incorporated in the law annually passed for the assessment of a state tax which was apportioned among the several towns of the state. The tax act of the year 1821 (ch. 107) provided for the assessment of taxes upon, among other things,

[1] Revised Statutes of 1836, ch. 7, § 3. [2] Revised Statutes of 1836, ch. 7, § 4.
[3] Revised Statutes, ch. 7, § 10, but this first appears in Acts of 1833, ch. 158, § 2.
[4] Revised Statutes, ch. 9, §§ 1 and 2, originally contained in Acts of 1818, ch. 190, and Acts of 1814, ch. 50.

public securities of all sorts and all bank and insurance stock and shares or property in any incorporated company for a bridge or a turnpike road or shares in any other incorporated company possessing taxable property, according to the just value thereof.

This is more explicit than the Revised Statutes already quoted.

Under the system established by these general provisions of law, corporations appear to have been taxed as follows:

First, as to real estate: All classes except railroad, turnpike and bridge corporations and possibly also canal corporations were taxed on their real estate in whatsoever town it lay; the four excepted classes were subject to a different ruling due to their different character and the different method of acquiring real estate. All other classes of corporations above referred to acquired real estate, like individuals, only by purchase, but these four classes of corporations acquired lands either by purchase or by exercising the power of eminent domain delegated by the state. The law as to the taxation of real estate[1] of railroad corporations (steam railroad corporations) was determined in Worcester *v.* Western R. R. Corporation, 4 Metcalf, 564., and the reasons of the decision apply as well to turnpike, bridge and canal corporations.

In this case the town of Worcester had attempted to tax the corporation on its buildings, namely, passenger depot, freight house, car house and engine house, in the town as real estate, liable to taxation for town and county taxes. Some of the buildings were partly within and partly without the limits of the location. The opinion of the court, delivered by Chief Justice Shaw declared that the establishment of the railroad

is regarded as a public work, established by public authority, intended for the public use and benefit, the use of which is secured to the whole community, and constitutes therefore, like a canal, turnpike or highway, a public easement * * * * [and] that to some extent at least, the works necessarily incident to such public easement, are public works, and as such exempted from taxation. Such we believe has been the uniform practice in regard to bridges, turnpikes, and highways, and their incidents; and also in regard to other public buildings and structures of a like kind; as state houses, forts and arsenals, court houses, jails, churches, town houses, school houses.

The court said further that the only question was as to the limits of this exemption from taxation, and held that as to the land within the location taken by eminent domain that and the structures or parts of structures upon it were exempt from taxation, but that structures or parts of structures outside of the limit of location (and presumably also land acquired by purchase outside of the location) were not within the exemption, but were subject to taxation.

[1] I include in the term "real estate" of a railroad corporation both the lands taken by it for general railroad purposes, technically termed the location, in which, of course, it has an easement, and also lands acquired by purchase for any railroad purpose.

Second, as to personal property: All classes of corporations were here on the same footing and appear not to have been taxed at all, except that manufacturing corporations were taxed on their machinery in the place where it was situated or employed, in accordance with the second exception, above quoted.[1] The tax act of the year 1821 expressly exempted from taxation machinery in cotton and woollen manufactories, and this exemption appears to have continued until repealed by chapter 143 of the Acts of 1828.

Doubtless the reason for this was that the several stockholders were taxable for their shares in their respective places of residence.[2] This is stated to have been the law as to the taxation of corporations in respect of personal property before the passage of c. 208, acts of 1884, by Chief Justice Bigelow in Commonwealth *v.* Hamilton Manufacturing Co., 12 Allen, 298 :

> Under the general laws regulating taxation in Massachusetts, corporations have never been liable to taxation for any personal estate owned by them, with the exception of machinery. * * * All other taxation, so far as it bore on corporate property, prior to the enacting of the statute in question (ch. 208 of the Act of 1864) was uniformly assessed on the stock as represented by the shares belonging to the individual stockholders, and was taxed to them according to the number of shares held by each in their respective places of abode, on a valuation ascertained by the market value of the shares, irrespective of the amount of property held by the corporation. These shares were declared by the statute to be personal property, for the purpose of taxation; Gen. Sts., c. 11, § 4 ; and were so treated, although the whole or a large part of the corporate property may have consisted of real estate, as in wharf, mining and water power corporations, and the like. Gen. Sts., c. 61, §§ 5, 10 ; c. 68, § 20. This tax on shares was clearly not a tax on the property of the corporation, but on the right or interest of each stockholder in the whole corporate organization, its franchise and privileges, as has already been explained, estimated at its market value.

This review of the former laws of taxation in Massachusetts shows that no tax whatever was imposed directly on the franchise of corporations, but that franchises were in fact taxed to the extent that they were reached by the taxation of the shares of the cor-

[1] Acts of 1832. ch. 158, § 2.

[2] Though the language of the tax acts is broad enough to cover the personal property of corporations as well as of individuals, and though the exemption specifically of the machinery of cotton and woollen manufacturing corporations naturally produces the inference that without such exemption it would have been liable to taxation, and the provision that the machinery of manufacturing corporations shall be taxed in the place where it is situated or employed naturally gives rise to the inference that otherwise it would have been taxed to the corporation in the town where it had its principal place of business, and though there was no express provision of law that corporations should not be taxed in respect of their personal property, nor any express provision that they should (except in the case of manufacturing corporations as to their machinery as above stated) yet that they were not taxable in respect of personal property, except manufacturing corporations for their machinery, appears to have been the practical interpretation of the law.

porations to the individual stockholders in their respective places of residence at the *market value* of the shares. Such taxation, however, of shares in corporations was made upon assessments by the local assessors. At first assessors were dependent upon returns made by individual stockholders, and upon such information as they might get by inquiry, for knowledge of holdings of shares in corporations by residents of their respective towns, but beginning with the year 1843, acts were passed which imposed upon the cashier of every bank, the clerk of every railroad corporation, of every insurance company except mutual insurance companies, and of every manufacturing bridge, turnpike and canal corporation, the duty of making returns annually between the first and tenth days of May to the assessors of every city or town of the Commonwealth in which any shareholder in the corporation lived, giving the name of each owner residing in the city or town, with the number of shares belonging to him on the first day of May of that year, the *par* value of the shares, and by requirement of a subsequent act the *market value* of the shares.

There were in Massachusetts in the year 1841, 305 towns and three cities, and now, by reason of subsequent subdivisions, annexations and incorporation of towns as cities, there are 335 towns and 33 cities. With 300, more or less, boards of assessors investigating the market value of the stock of different corporations, ascertaining the real estate on which they were locally taxed, and in the case of manufacturing corporations the machinery also locally taxed, it is clear that even if all performed their duties with diligence and skill and adequate valuations of the shares were made for purposes of taxation, such a system would be wasteful of time and effort. One would rather expect, however, that there were marked differences in the care and skill exercised in the performance of duties and decided variations in estimates of market values, for there must have been then, as now, there were many corporations whose stock was not bought and sold in the open market, and whose market value or assumed market value could not therefore be determined except by special and thorough investigation. But both before the passage of the law which required returns of holdings in corporations to be made to the assessors in the several towns, and after it, while this system existed, it is clear that as to all shares in every corporation held by persons living outside of the state, that portion of their market value which exceeded the

proportion of that value corresponding to the value of the real estate and machinery locally taxed, escaped taxation entirely.

This system of assessment continued in force until the Civil war produced such an increase in public expenditure as to cause legislators to look about for additional sources of revenue. Beginning with the year 1862, various acts were passed for the taxation of corporations, fire, marine, and fire and marine insurance companies and savings banks first receiving attention (Acts of 1862, c. 224). A general law for the taxation of corporations was passed in 1864 (c. 208), which contained the foundation principle of the present system, the tax being levied on the market value of all the capital stock after making certain deductions. This act was superseded in the following year by the act (c. 283) which embodies the substance of the present law.

FRANCHISE TAX UPHELD BY THE COURTS.

Before describing how the system established by this last act actually operates, let us glance at a few judicial decisions which interpreted these earlier statutes and upheld the legality of the statutes. The corporations strove to avoid payment of taxes, contested the constitutionality of the statutes and attacked their provisions in other ways. The act taxing savings banks, although its object as expressed was "to levy taxes * * * on depositors in savings banks," in fact levied an annual tax on every savings bank, payable in two semi-annual instalments, on the average amount of its deposits for the six months preceding each of two dates in the year, and this tax was held valid as an excise on the franchise of the corporation in Commonwealth *v.* People's Five Cents Savings Bank, 5 Allen, 428, and also in Commonwealth *v.* Provident Institution for Savings, 12 Allen, 312, notwithstanding that in the latter case part of the deposits were invested in United States bonds, and this latter case was affirmed by the supreme court of the United States in Provident Institution *v.* Mass., 6 Wallace, 611, and see also the preceding case, Society for Savings *v.* Coite, 6 Wallace, 594 (a Connecticut case, upon a statute requiring savings banks to pay a tax of a certain percentage upon the amount of their deposits on a certain day).

The power of the legislature to require domestic corporations o pay a tax upon the excess of the market value of their capital ock above the value of their real estate and machinery, taxable

where situated, as an excise on the franchise or privilege of each corporation was affirmed in Commonwealth *v.* Lowell Gas Light Co., 12 Allen, 75, although the decision in that case turned upon other points. But the question was more fully considered and affirmed in three cases reported together and generally cited under the name of the first, Commonwealth *v.* Hamilton Manufacturing Co., 12 Allen, 298, in which cases it was also decided that the fact that such a corporation owns as part of its personal property U. S. bonds, and that some of its stockholders live outside of the state, will not exempt it from liability to pay the full amount of such tax. This decision that the tax was valid as a franchise tax was affirmed by the United States Supreme Court in Hamilton Co. *v.* Mass., 6 Wallace, 632.

Another important case under the Act of 1864 was Commonwealth *v.* Cary Improvement Co., 98 Mass., 19. The defendant was a land company. The tax assessed was based upon actual sales of the company's stock, and the defendant contended that the tax was unreasonable in the sense of the constitution, part 2, ch. 1, § 1, art. 4, being computed on a speculative value exceeding the value of all the property owned by the corporation. The court held that it was not unreasonable in the sense of the constitution, that it was not levied as a tax on property, but was an excise tax; that the value of the property of the corporation was not intended to furnish the basis of the taxation, but the value of the capital stock, which might be determined by actual sales.

METHOD OF VALUING FRANCHISES.

The present system for the taxation of corporate franchises, based upon charter 283 of the Acts of 1865, is as follows: The treasurer of the state is the tax commissioner, and has a deputy who is commissioner of corporations. Every corporation chartered by or organized under the general laws of the state for purposes of business or profit, having a capital stock divided into shares,[1]

[1] The only exceptions to this sweeping provision are banks (no state banks exist), corporations chartered or organized for the purpose of engaging without the limits of the state in the business of coal mining or other mining, quarrying or extracting carbonaceous oils from the earth or for the purpose of purchasing, selling or holding mines or lands without the state, corporations formed under the general laws to construct railroads or railroads and telegraphs in foreign countries, and also savings banks, life insurance companies and mutual insurance companies all of which are subjected to special excise taxes. All companies, co-partnerships and other associations having a location or place of business within the state, if the beneficial interest is held in shares which are assignable without the consent of the other associates specifically authorizing such transfer, are subject to the same method of taxation as domestic corporations.

is required to return annually, between the first and tenth of May to the tax commissioner under the oath of its treasurer a complete list of its shareholders with their places of residence, the number of shares belonging to each, the amount of the capital stock, its place of business, and the par value and the market value of the shares on May first. The return shall also state for stock held as collateral security, both the name of the holder and the name of the pledgor and his residence. Further, it shall contain a statement in detail of the character, location and value of the works, structures, real estate and machinery owned by the corporation and subject to local taxation *within* the state. Every corporation, except railroad and telegraph companies, shall also return the amount, value and location of all works, structures, real estate and machinery owned by it and subject to local taxation *without* the state. Railroad and telegraph companies give the whole length of their lines and the length of so much of their lines as is without the state.

Every guardian who holds, or whose ward holds, shares of stock in any corporation and every executor, administrator or other person who holds in trust any such stock, shall between the first and tenth days of May in each year return under oath to the tax commissioner their names and residences on the first of that month and those of all such wards or other persons to whom any portion of the income from such stock is payable, the number of shares of stock held and the name and location of the corporation, etc., in which they are held. Every partnership also is required to make like returns stating the amount of such stock owned by the firm, the names and residences of all partners and the proportional interest or ownership of each in the stock.

It is the duty of the assessors of every city or town on or before the first Monday of August to return to the tax commissioner the names of all corporations except banks of issue and deposit, having a capital stock divided into shares chartered by or organized under the general laws of the state for the purpose of business or profit and established in their respective cities or towns or owning real estate therein; also a statement in detail of the works, structures, real estate and machinery owned by each corporation, the amount for which the same is assessed in the city or town for the current year, and also at the same time to return to the tax commissioner the amount of taxes laid or voted to be laid within the city or town for all town purposes.

The tax commissioner is required to ascertain from the returns or otherwise the true market value of the shares of each corporation and to estimate therefrom the fair cash value of the capital stock on the preceding May first, which is to be taken as the value of its corporate function for the purpose of taxation. He shall also ascertain and determine the value and amount of all real estate and machinery owned by each corporation and subject to local taxation and of the deductions mentioned below. For this purpose, he may take the amount at which such real estate and machinery are locally assessed, but this local assessment is not conclusive.

In case the value of the real estate and machinery, located within the state, of any corporation, as determined by the tax commissioner is less than the value fixed by the local assessors, the commissioner is to notify the corporation of such determination and the corporation thereupon within one month may make application to the assessors for an abatement, and if such abatement is refused, prosecute an appeal to the county commissioners of which it must give notice to the tax commissioner. The decision of the county commissioners is conclusive as to the value. If the corporation fails to apply for an abatement, or having made such, if it fails to appeal from the decision of the assessors, the determination of the tax commissioner is conclusive.

Every corporation so taxable shall annually pay a tax upon its corporate franchise at a valuation thereof equal to the aggregate value of the shares in its capital stock, as determined by the tax commissioner, after making the deductions mentioned below, at a rate determined by an apportionment of the whole amount of money to be raised by taxation upon property in the state during the same current year as returned by the assessors to the tax commissioner, as above mentioned, upon the aggregate valuation of all the cities and towns for the preceding year as returned annually by the assessors to the secretary of state.

From such valuation of the corporate franchise so determined, the following deductions are made:

First, in the case of railroad and telegraph companies whose lines extend beyond the limits of the state, such proportion of the whole valuation of their capital stock, as the length of line lying without the state is to that of the entire line, and also an amount equal to the value of the real estate and machinery locally taxed within the state.

Second, in the case of all other corporations subject to this form of taxation, an amount equal to the value of the real estate and machinery subject to local taxation wherever situated.

A corporation taxable under these provisions, if aggrieved by the decision of the tax commissioner, may appeal to a board consisting of the state treasurer, state auditor and one member of the council designated by the governor.

Although these taxes on corporations are assessed and collected by the state, the disposition of the greater part of them is the same as when the shares were assessed to the owners by the local assessors. The proportion of the taxes corresponding to the proportion of the stock of the corporation owned by residents of the state is credited and paid to the several cities and towns where it appears from the returns or otherwise that such shareholders lived on the first of May preceding, according to the number of shares so held in each city and town. The remainder, collected on shares held by persons living out of the state, is retained in the state treasury.

FINANCIAL RESULTS.

Turning now to the practical results of this system of taxation, I have obtained the following from the state auditor's report for 1899: The total amount collected in that year by the state treasurer was $5,202,266.67 from 1908 corporations, which includes the amount directly collected, assessed in the year 1899, of $5,134,983.77. The sum received in 1899 from delinquent corporations on account and previous years, was $49,934.52. And from cities and towns on account of over-payments of their shares of corporation taxes in 1898 and previous years, $17,348.38 were received. Total, $5,202,266.67. Of this sum the state paid to cities and towns on account of the years 1898 and 1899, $4,253,136.10, leaving $949,130.57 as the revenue derived by the state.[1]

The rate of the corporation tax in the year 1899 was obtained according to the method described above, by apportioning the

[1] The total revenue of the state in the year 1899, deducting the portions of corporation taxes and national bank taxes paid to cities and towns, was $8,817,380.50, of which the sum derived by the state from the general corporation tax as shown above ($949,130.57) was 10.76 per cent. But this is not the total revenue derived by the state from corporations. Other taxes are the savings bank tax, excise tax on life insurance companies, tax on the Massachusetts Hospital Life Insurance Company, annual insurance companies' tax, life insurance companies' tax, coal and mining companies' tax, railroad commissioners' tax, foreign railroad companies' tax, and very small sums in the shape of fees from the gas and electric light companies. The total for 1899 was $2,082,961.86 which is 23.62 per cent of the total state revenue.

total amount of taxes assessed for state, county and city or town purposes in the whole state in 1899, as returned by the assessors of each city and town to the tax commissioner, upon the aggregate valuation of real and personal property in the state for purposes of taxation in 1898, as returned by such boards of assessors to the secretary of state. The rate thus obtained is practically the average rate of taxation throughout the state, and for 1899 was $15.78 per thousand dollars. Applying this rate to the corporation tax assessed and collected—$5,134,983.77—, it appears that this corporation tax was collected upon an aggregate valuation of the excess of corporate franchises thus taxable of $325,410,885.

From the tables in the auditor's report for 1899, I have taken out the various public service corporations, and find the number of such, and the taxes paid by them to be as follows:

39	Steam Railroad Companies	$1,642,626.45
97	Street Railway Companies	746,892.86
73	Gas and Electric Light Companies	115,783.97
37	Water Companies	15,833.88
16	Telephone and Telegraph Companies	793,662.04
5	Miscellaneous Companies	15,237.01
		$3,330,036.21

This is 64 per cent of the total amount obtained by the state from the general corporation tax in 1899, and represents an aggregate valuation of the excess of these corporate franchises thus taxable of $211,028,910.

HOW THE TAX SHOULD BE DISTRIBUTED.

One feature of the Massachusetts system of taxing corporations is open to criticism, viz., the method of distributing the proceeds, as already stated, the taxes paid by corporations, though collected by the state to the extent that shares in them are held by residents of the state, are credited and paid to the various cities and towns in which the stockholders live.

In the case of public service corporations, the value of the franchise depends upon the concentration of the population in the cities and towns where these corporations have their tracks, pipes, lines and plants. To the extent that the expenditure of taxes in these cities and towns makes them desirable as places for business and residence, and attracts population, such corporations

get a benefit from the local expenditure; but the franchise taxes which these corporations pay do not necessarily go to the cities and towns where the corporations are located; they are distributed solely with reference to the places where the various stockholders have their domiciles. A concrete illustration shows best the unfairness of the method.

Under a resolve passed by the legislature in 1896, a commission was appointed "to inquire into the expediency of revising and amending the laws of the Commonwealth relating to taxation." This commission made its report in October, 1897, and in it called attention to the concentration of well-to-do taxpayers and of their personal property in a limited number of towns. I quote from this report the following table showing the distribution of the corporation tax, and a comment upon the results shown by the table.

	Population 1895.	Tax Distributed 1896.	Tax Distributed per capita.
State	2,500,183	$2,585 795.63	$1.03
Thirty-two cities	1,635,767	1,778,359 23	1 08
All towns	864,416	807,436.40	.93
Eighteen towns	62,529	332,310 77	5.31
Three hundred and three towns.	801,887	475,125.63	.59

The eighteen selected towns get five times as much as the average for the state, per head of population, of the proceeds. As compared with the remaining towns, less fortunate in the ownership of securities by their inhabitants, these few towns get nearly ten times as much per head of population. The commission recommended that the county expenses should be assumed by the state and that the proceeds of the corporation tax should be retained by the state and applied to paying county expenses.

The question how to distribute these corporation taxes so as to adjust the burdens of taxation fairly, is not an easy one but certainly in the case of steam railroads good reasons can be given why such corporation tax should be retained in the state treasury, though these reasons would perhaps have less force when applied to the other public service corporations whose field is much more limited. Of course, the Massachusetts method of distributing the corporation tax is not an essential part of the system. If this tax is to be distributed among the different cities and towns, there is no reason why some other method should not be followed as, for instance, distributing it either in proportion to the population or to the assessed values of property.

It is not within the scope of this article to make any comparison between the Ford bill and its amendments, and the Massachusetts system of taxing corporate franchises. The problem, how to tax these franchises, is a local one in each state involving consideration of constitutional provisions, existing laws in relation to taxation, perhaps special legislation in regard to corporations or different classes of corporations, possibly also contracts made by municipalities with particular corporations, or locations granted by them to corporations on special terms and conditions, and, last but not least, decisions of the courts. One state may find the course of legislation in another useful as affording suggestions, but may not be able to make a close imitation of it. As to the Massachusetts system of taxing corporate franchises, it may be said that the state has been fortunate in developing a system, which is simple, which is easily worked, which reaches the corporations, and above all which is solidly established by decisions of the courts.

But let me not be understood as regarding this system as a finality. As long as the people look upon the general property tax as the guiding principle in taxation, this system of taxing corporate franchises may be well enough. But when the people learn to appreciate that the use of public ways is essential to the existence of the public service corporations, that the grants of privileges in public ways and public places is simply a gift of public property, and that in creating such franchises the community abdicates a performance of duties that it should itself undertake as part of the service of the government, then the time will arrive when they must consider how the government can resume its proper functions, and how to assert the right arising under Article VI of the Declaration of Rights prefixed to the Constitution of Massachusetts,

> that no man or corporation or association of men have any other title to obtain advantages or particular and exclusive privileges distinct from those of the community than what arises from the consideration of services rendered to the public.

It will be the task of the community then to find some way to make every individual and corporation, possessing any such privilege, render an adequate equivalent for it to the public. Exercise of the taxing power would be one means to that end.

STATE CONTROL OF CORPORATIONS.

By James Blake Cahoon.

If we consider the general question of what form our laws shall take in order to secure the greatest benefit to the people and municipality in the management of public utilities, it will, I think, be conceded by all who have made a careful study of this subject, that our legislatures should be governed by the spirit of the utmost fairness to invested capital as well as to the people. These laws should be definite, and forecasting the future somewhat, will undoubtedly prescribe state control, to a greater or less degree, for all forms of service that may be classed as public utilities. Almost necessarily the execution of such laws should be placed in the hands of a commission composed of at least two, and not more than three, members chosen by popular vote and not appointed for political reasons; and in order that the best results may be obtained, the term of office should be a long one, similar to that of the justices of the supreme court of the State of New York; and while holding office the members should not engage in any other business.

COMPETITION SHOULD BE ELIMINATED.

This class of corporations should not in any sense include those corporations which are open to competition. The fundamental basis of the former is that they are of a right and should be absolute monopolies. Only by so construing their rights can the best service be given to the people. Formerly it was held that, in order to secure cheap rates, it was necessary to have competition, but years of competition prove that competition raises prices instead of lowering them, as will be seen when we consider the actual result of two electric light companies competing in the same town. First one and then the other cuts the price until both are losing money. The inevitable consolidation takes place. One plant is shut down, the other operated; but the interest on the bonds of both has to be paid, and the excess of interest over what should be

required for a plant of sufficient capacity to supply the town ultimately comes out of the pockets of the people. If competition had not been let in, only the interest charges for the proper sized plant would have to be met, and therefore the corporation could furnish the light at a less price and make an equally good profit for itself.[1]

Let us assume then that these public utilities are monopolies and are protected as such. It immediately becomes the function of the commission to lay down as the first prime requisite of cheaper rates, that there shall be only one corporation supplying a given public service in any town. Public control, being established, should look, first, to the protection of the people; second, to the protection of the capital invested; and third, to the rendition of service at such a price as will permit of its general use, and return to capital a fair interest on its investment.

SECURITIES SHOULD BE LIMITED.

The first question to arise is whether bonds or stock or both shall be issued and to what extent. The laws of Massachusetts permit the issue of both bonds and stock to pay the cost of construction, but only in amount necessary for the work in question, and the issue must be approved by the board of commissioners, with the understanding that no stock shall be sold at less than par. The capitalist who wants to invest money in a corporation of this kind cannot issue what bonds and stock he thinks he can pay interest and dividends upon. He is barred from watering either the stock or the bonds.

This may appear arbitrary, and in a certain way it is. The legislature sought to protect the investor, and if one looks at the matter in all its bearings, it will be seen that this power of limiting the amount of securities issued is equally a benefaction to the real capitalist and to the innocent investor. The only one injured is that modern pirate, politely called the promoter. But even though this power does protect the investor and capitalist, and indirectly the consumer, by minimizing the interest charges on the plant, it is a question whether such interference—the saying to a man he shall not invests as he pleases or take such risks as his own judgment dictates—is not exercising too much of the paternal right to be altogether satisfactory to the general mass of

[1] For the experience of Great Britain, see an article in this issue.

the people. I should rather say that the commission should have the power to limit the bond issue to the actual cost of the plant and permit the organizers to issue whatever amount of stock their judgment deems best.

Possibly the better plan to protect both parties, and eventually inure to the benefit of the plant, would be for the commission to authorize the issuance of bonds to such an extent that seventy per cent of the bonds issued would pay the cost of the plant and the remaining thirty per cent be deposited with a trust company who, by receiving the interest on the thirty per cent and placing the same at compound interest, would be enabled to guarantee and pay the whole issue at maturity, say in thirty years. This would effectually take care of the much mooted question of retiring the bond issue at maturity.

FRANCHISES TO BE GRANTED BY STATE BOARD.

The commission should have the power to determine the life and form of contract entered into between the corporation and the municipality. The prevailing method of granting franchises by resolution of the council is open to serious objection. In one city a corporation may be able to so influence the council as to secure a grant that is very advantageous to the corporation and an equal hardship to the municipality, while in an adjoining city conditions may be reversed. This should be a strictly business transaction, and the contract should be determined by local conditions and so fixed as to be equally beneficial to both parties. It is impossible to eliminate self interest, and hence to secure equal justice both parties should be willing and glad to leave the adjustment to a disinterested party like the commission. This has never been done in the United States that I am aware of, but it is a solution of the difficulty which stands in the way of securing the best return to the municipality for the money expended as well as a fair profit for the corporation undertaking to serve the municipality.

In framing a franchise grant, lower prices should be considered rather than a large cash compensation to the city. In some instances, the municipal authorities have set an arbitrary rate at which the corporation shall sell its commodity. This is a needless restriction and too arbitrary, for the council is incompetent to judge of what constitutes a fair price for the commodity, and the corporation naturally seeks to make as large a profit on the enterprise as possible, and to do this would not place a price on its

commodity which would prevent its free purchase. The phrase, "large sales and small profits," is particularly applicable to this class of business enterprises, and the lesson has been well taught by the many failures of corporations to declare dividends, their price having been set so high as to make the use of their commodity a luxury and hence limit its output. In seeking the reason for their failure, this fact has been exhibited so clearly as to widely emphasize the economy of large use at low prices.

TAXES SHOULD BE MODERATE.

Many methods of taxing public utilities as such have been tried but none of them are satisfactory, for the reason that legislators have conceived the idea that this class of corporations should be throttled rather than assisted. I hold that public service corporations are public benefactors and should be encouraged in every way.

Further, the imposition of a tax raises the price of the commodity. In other words, the state and municipality impose a burden on the citizens of a community having public utilities, that is not placed upon those not having such, which works in effect to the repression of such utility and to the restriction rather than the extension of its use. The more advanced a community becomes, the heavier the tax imposed upon it. The state, which should do all possible to promote the comfort and enlightenment of its citizens, stands arrayed against such progress, merely because the authors of its taxation laws did not comprehend the first principles of economics. Public utilities are primarily for the benefit of the people, and instead of the state doing that which will enhance the price of their commodities, it should do all in its power to lower the price so that the maximum number of its citizens may be able to benefit from their general and wide-spread usage.

The citizen and legislator should clearly comprehend that though legislatures may pass laws imposing a tax upon the franchises and property of public corporations, it is not the corporation that ultimately pays the tax but the users themselves; for in making up the price at which it will sell its commodity, the corporation first determines the cost, and one of the principal factors in the cost is the amount of taxes paid. To this cost is added the profit determined on, the sum being the price to the consumer—

the citizen who wanted the tax imposed on his arch enemy, the public corporation.

CITY AND CORPORATION TO BE PARTNERS.

We have been working in a wrong direction, and I believe the right solution, and one that must ultimately be adopted, is for the municipality and the public corporation to form a joint partnership on some such basis as the following:

First: The municipality to give one corporation alone the necessary perpetual franchises and rights to enable it to successfully prosecute its business.

Second: The bonds to be amortized by annual payments to a reserve fund, which shall, with the interest on the bonds, enter as a factor into the cost of the product, the municipality guaranteeing the payment of the bonds and interest.

Third: The corporation to be permitted to conduct the business, and the two with the commission jointly to fix a price so that after reckoning all the factors of cost, there shall be allowed to the corporation as a first profit, an amount equal to the legal rate of interest on the cost of the plant, and as much more profit as they may decide. The additional profit to be divided one-third to the corporation and two-thirds to the municipality. The receipts from this source to be treated as taxes received and apportioned between the town, county and state in accord with the tax levy.

The benefits to be derived from such a plan would be:

(1) The lowest possible price to the people.

(2) The maximum stability and usefulness of the corporation to the community.

(3) The divorcing of public utilities from politics.

Such a radical change of public policy would necessarily take years for accomplishment, and the plan outlined therefore partakes somewhat of the nature of a prophesy. Neither legislators nor people, in there blind efforts to suppress the growth of capital, will look at the matter in the light thus presented until dear experience has taught them the necessary lesson.

With the establishment of a commission, it almost necessarily follows that such commission should be the arbitrator on all differences of opinion that might arise between the citizens and the corporations, and between the municipality and the corporation. This involves the setting of a standard of service by the com-

mission, and its duties should extend to the strict enforcement of the standard set.

The commission should prescribe the method in which the corporation should keep its accounts and should require such corporation to render to the commission a statement of all its receipts and disbursements on a prescribed form and in such manner that the cost of furnishing the commodity shall be shown, and also the profit which shall be apportioned in the manner set forth above. This statement should be rendered at least annually and the commission should make a report to the legislature in such form that all the matters required from the corporation in their report shall be presented in detail and published in pamphlet form in sufficient number to supply all directly interested.

The commission should be required to investigate all serious accidents and should have the power to enforce such regulations as they may deem best for the public safety.

In general then we may sum up the matter as follows:

1st. Public utilities should be monopolies and exempt from ordinary taxation.

2nd. Should be under state control through a commission.

3rd. Such commission should have such definite power and authority granted them as may be necessary to protect both the public and corporation.

STATE SUPERVISION IN MASSACHUSETTS.

FIFTEEN YEARS OF THE GAS COMMISSION.

By Walter S. Allen.

ORIGIN OF PUBLIC CONTROL.

The history of gas companies in Massachusetts prior to 1885 deals principally with unrestrained competition, rate wars, consolidation, over-capitalization, unregulated monopoly and the formation of new companies resulting in the repetition of this vicious circle, until the consumer groaned under his burden; for no matter how expensive the process, in the end the companies saddled the cost upon the consumer by increasing prices or by failing to reduce them as rapidly as the development of the industry would warrant.[1] The companies distrusted the municipal authorities because the latter were always granting franchises to new companies, frequently of a speculative character. The public lost confidence in their officials, because they saw how seldom the city authorities were able to keep the companies within bounds. Soon after 1880, however, gas managers began to appreciate the drift of the industry, to realize that competition was bad for them, that instead of opposing state supervision they ought to favor it, and that some degree of publicity and a state commission to stand between the companies and the consumers would be a low price to pay for a monopoly.

SCOPE OF SYSTEM.

The immediate occasion of the establishment of a commission was the fight between the Boston Company and the Consumers and the Bay State companies. The latter had control of water-gas patents and were striving to get a foothold in Boston. The Boston Company was strongly opposed, of course, and in its eager-

[1] The *Quarterly Journal of Economics* for 1898, 1899 and 1900 contains several valuable articles by Professor John H. Gray which constitute the most thorough and scientific analysis of the Boston Gas Companies yet written.

ness to preserve its control had a bill introduced into the legislature in 1885.[1] This act as finally passed placed the gas companies of the Commonwealth under the supervision of a board of gas commissioners appointed by the governor, to which was given the right to regulate prices and service, and which was authorized to require from the companies full and accurate statements of their business. In return for this obligation put upon the companies, the state granted to the existing companies the right of appeal from the decision of the local authorities to the state board in the event of a second company being granted permission to lay mains in the streets.

As soon as the commission organized and began its investigations, it found that a uniform system of bookkeeping must be established for all the companies, so that their accounts might be comparable. In 1886, at the request of the commission, a law was passed requiring this, and uniform methods of accounting were prescribed by the board. The same act limited issuance of bonds by gas companies to an amount equal to their capital stock, and fixed a maximum rate of interest on the bonds, and forbade leasing without the consent of the legislature.

In 1888 the Commonwealth found gas and electric light companies in active competition with one another, and duplicate electric light plants were being put in by gas companies in the attempt to secure to themselves this field. To bring the whole lighting industry under the control of the state, a law similar in scope to that of 1886, but relating to electric light companies, was passed, and the commission was also authorized to grant to gas companies the right to supply electric light, a power which up to this time belonged to the legislature. With minor changes the laws re-

[1] The system of public control prior to 1885 consisted of state inspection of the quality of the gas, the testing of meters and statutory limitations on prices of gas and capitalization. The method of procedure was through the ordinary civil courts. As Professor Gray says in his article in the August number of the *Quarterly Journal of Economics*, which has appeared since this article was written: "It generally happened in such cases that all the important evidence was in possession of one party, with the burden of proof on the other. The attempt to employ expert witnesses proved comparatively useless; first, because the only men whose knowledge justly entitled them to be called expert were too expensive for the plaintiff to employ as witnesses; second, because such men expected future permanent employment from the companies, and, therefore, would not incur their enmity by testifying; and, third, because, however much knowledge they might possess, it was generally knowledge of a different set of circumstances from those under consideration."

lating to lighting companies remained the same until 1894, when the so-called anti-stock watering bills were passed. These provide that the gas commissioners shall pass upon and authorize the issuance of all increases of capital stock, and shall fix a price at which such increases may be offered to the stock-holders, any stock not so taken being offered to the public at auction.

This brief statement covers the principles laid down by the legislature as to the relationship of the state to the gas and electric light companies. After fifteen years, which have been very stormy years for the gas industry in Massachusetts, it is interesting to see how this method of control has worked.

THE BOSTON COMPANIES.

At the time the act of 1886 was passed, the situation in Boston was already such that the board found itself unable to interfere, and all it could do was to make clear to the consumers and the investing public the exact relationship of the different companies to them and to one another.

In 1884 a company had been organized under the laws of Delaware whose purpose was to hold through a trustee all stocks of the various Boston companies, which had been incorporated under Massachusetts laws, and which were actually supplying gas to consumers. This Bay State Company, while it is the one about which so much is heard, has no standing under the statutes of Massachusetts, and inasmuch as it does not open the streets nor supply gas, it does not come under the control of the state. The stocks of the Boston companies were conveyed to trustees, but each, although with the same officers and offices, continued in the eyes of the law to be an independent company, and with these independent Massachusetts companies the gas commissioners had to deal. Bonds were issued secured by the pledge of the stock of the Massachusetts companies, and stock was issued in the Delaware company and increased at different times until it finally reached extraordinary amounts, this stock being supposed to represent the equities in the Massachusetts stocks over and above the claims of the bonds.

As a result of certain legislative inquiries, an investigation was made in 1892 by the board into the relations existing between the various companies controlled by the Bay State Gas Company

of Delaware, and a special report made at that time showed the existence of evils, which were to a great degree immediately remedied. No legislation, however, was passed at that time.

The following year a resolution was introduced into the legislature by the mayor of Boston, based largely upon the special report of the board and upon the facts disclosed in its annual reports. The agitation then carried on had for its object the securing of a lower price for gas and the elimination of over-capitalization, and incidentally it attempted to destroy the control by a foreign corporation of the Massachusetts companies.

WATER SQUEEZED OUT.

The investigation was called for on the ground that the Massachusetts law fixed the maximum capital of a gas company at $500,000, and that in order to build the works of the Bay State Gas Company of Massachusetts, a bond or obligation of $4,500,000 in addition to this amount was issued to the construction company which built the works. It was claimed that this bond did not represent property, but was simply intended to divert profits to the Bay State Gas Company of Delaware. The legislature appointed an investigating committee, before which the mayor of Boston appeared as prosecuting officer, and a bill reported by this committee was passed which provided that unless this bond, which at that time was the property of the Bay State Gas Company of Delaware, should be cancelled, the charter of the Bay State Gas Company of Massachusetts, should be revoked. It also provided that commissioners should be appointed by the supreme court who should determine the value of the plant of the Bay State Gas Company of Massachusetts, and that the company might then issue stock equal to this value as found. This commission appraised the plant at $2,000,000, and the stock was issued to this amount and the bond cancelled.

CAPITAL INCREASED BY RATE WAR.

While the investigation was going on, the Brookline Gas-Light Company, which was operating in one of the suburbs, was given a contract for street lighting, and was allowed to cover nearly the whole of Boston with a duplicate set of mains. A bitter war for business followed, finally resulting, after the addition of some $4,000,000 to the actual invested capital, in a compromise and vir-

tual consolidation, although the companies preserve their identity.

It was early recognized by the gas commissioners that if possible this duplication of plant and waste of capital should be prevented, and the attorney-general was requested to begin proceedings to stop it; but he declined to do so, and there was no way open to the board, except through the attorney-general, by which to bring the matter into court.

In 1895, at the request of the legislature, a special report was made on the expenditures of the Brookline Gas-Light Company, and various items which had been charged to construction were shown by the commissioners to be properly chargeable to current expenses, and therefore should not be allowed to stand as capital. The next year this report was revised on petition of the company, which succeeded in proving that certain of the charges disallowed by the commission were legitimately construction expenses and might properly be capitalized.

CONTROL EVADED.

In 1897 another company came into the field by virtue of a special act of the legislature, concerning which of course the commissioners had nothing to say. This was the Massachusetts Pipe Line Company, organized merely to be a distributing company. Behind it was the New England Gas and Coke Company, a voluntary association organized for the purpose of evading so far as possible the laws of Massachusetts in relation to capitalization, publicity of accounts, etc., and this company was to supply gas to the Pipe Line Company, which in turn was to sell it to the various companies in the Boston district. As the result of the various fights and compromises, most of the stock of a number of these companies became the property of the promoters of the Gas and Coke Company, and was in turn deposited with a trust company as the basis for bonds issued by the Gas and Coke Company. In 1897 the commissioners called attention to evasions of law on the part of the Pipe Line Company, and at the request of the legislature made a special report on the comparative cost of coal and water gas, and the possibility of changing the supply in Boston from water gas to coal gas. In 1898 a report was also made on the consolidation of the various companies in Boston under Massachusetts law, and drafts of bills were submitted, but nothing was done by the legislature in this connection. The New England Gas

and Coke Company and the Massachusetts Pipe Line Company declined to make returns to the board on the ground that they were not obliged to, and the matter was reported to the attorney-general, who held that so long as the Gas and Coke Company did not actually engage in the business of supplying gas no reports were required.

The situation then in Boston is this: The stocks of the Boston, Roxbury, South Boston and Bay State Companies, all Massachusetts companies, are deposited with a trust company to secure the issue of the Boston United Gas Bonds, made by the Bay State Gas Company of New Jersey, a company whose stock was owned entirely by the Bay State Gas Company of Delaware, thus bringing any equities in the Boston stocks into the hands of the Delaware company. The stocks of the Brookline, Jamaica Plain, Dorchester and Massachusetts Pipe Line Companies are, with other securities, patent licenses, etc., deposited with a trust company to secure the New England Gas and Coke Company's bonds. The various companies in Boston are working together in harmony, competition having ceased in 1896.

The New England Gas and Coke Company is at the present time engaged in making coke, and sells to the Massachusetts Pipe Line Company a certain amount of the gas which is made as a by-product, and in turn the Pipe Line Company sells to the Brookline and Jamaica Plain companies this gas, and proposes soon to supply other companies in the Boston district.

HAVERHILL GAS CASE.

In 1899 an attempt was made to repeat the procedure of the Bay State Gas Company of Delaware and the New England Gas and Coke Company, and to issue securities based on the stock of Massachusetts companies. This was accomplished in the face of the fact that the law prohibits the issue of such stocks by a foreign company under penalty of a forfeiture of the Massachusetts companies' charters, and was done by incorporating a Massachusetts company under the general laws for the purpose of doing a brokerage business and holding securities. This company, known as the Haverhill Gas Securities Company, bought the stock of the Haverhill Gas Light Company, and issued its own stock and bonds. The matter was brought before the commissioners, on a petition to reduce the price of gas, and the profits of the local company were re-

duced by an order making a reduction large enough probably seriously to hamper the success of this scheme although leaving enough profit for the actual capital invested. The board also recommends in its report of this year that the legislature repeal the charter of the Securities company.

WATERING OF STOCK PREVENTED.

In 1888, in its annual report and in several of the decisions reducing the price of gas, the board called attention to the evils of watered stock, and in 1894 a law was passed prohibiting the issuance of stock by gas and electric light companies without the consent of the board. Under this law in the last six years, eighty-five cases have been acted upon, and while but very few applications have been rejected entirely, in a great many cases the amount of capital asked for has been scaled down. The security given by this statute, that capital stock shall represent actual property, has enhanced the value of Massachusetts gas and electric light stocks in the eyes of investors, and during this last year a company whose plant is located in Iowa has taken out a Massachusetts charter, and applied to the gas commissioners for the authorization of capital, stating frankly that this was for the purpose of assuring investors that the stock represented actual property.

CONTROL OVER PRICES.

The law provides no way by which the gas commissioners shall take the first steps towards investigating the price of gas in any place and ordering a reduction, the assumption being that the provision in the law that twenty consumers or the mayor of a city may petition for such reduction is a sufficient protection to the public, inasmuch as a grievance must be very slight which will not bring a case before the board in one of these ways.

Acting under the powers to reduce the price of gas, the commission has in eighteen cases reduced the price on petition, and in one case has declined to do so. In four cases the prices were voluntarily reduced before a hearing was held, and the petitioners withdrew, and in five cases the price of electric light has been reduced on petition.

The agitation for lower prices in Boston led the commission to make several rulings reducing the price, until in 1893 a price of one dollar was reached for the Boston Gas-Light Company, and

this rate has since been extended either voluntarily or at the recommendation of the commission to nearly all companies supplying Boston.

In 1894 a special report was requested by the legislature as to the effect of the reduction of the price of gas the previous year in Boston, the usual complaint having been made that with the reduction of price, pressures had been increased and that meters were incorrect, and therefore bills were as large as before the reduction. This report, which was very full, showed the incorrectness of all these statements.

HOW PRICES ARE FIXED.

The general principles adopted in fixing prices are as follows: A company having a monopoly is entitled to charge only what is necessary under efficient and progressive management to pay a moderate rate of profit on the present value of the undertaking—cost less depreciation. A surplus accumulated out of earnings belongs *legally* to the shareholders, but the consumers are entitled to share it. In case the company has tried to evade the law as to watered stock or capitalization of surplus, the commission not infrequently punishes it by reducing prices so low as not to pay a fair rate of dividend on the *nominal* stock value. This is just, for the real value is the only true and correct basis. A few quotations from the reports will suffice to show the general trend.

The burdens of reckless management belong to the corporation, and not to the public.

The profits of companies supplying this kind of public service must compare favorably with those which a new company might need to pay a fair dividend, when fully equipped to render the same service.[1]

The ordinary demands which a progressive management desires and is bound to meet may fairly be provided out of incomes, when the price of gas is not made so high as to be burdensome.[2]

This surplus must, we believe, be regarded as the combined result of a wise corporate management and the contributions on the part of the public. It would seem that the company is under obligation to so use a surplus of this character that substantial advantages may accrue from it to the public, and such a course will bring added strength to the corporation itself.[3]

If by reason of superior skill management, or by the existence of a common control in companies supplying contiguous territories, special economies become available, while the corporation which secures these results is entitled to a liberal reward, the public should also receive, as a matter of sound business policy, some share in the benefits thus made possible.[4]

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[1] Eleventh Annual Report, p. 14

[2] Tenth Annual Report, pp. 81.

[3] Ninth Annual Report, p. 11.

[4] Ninth Annual Report, p. 18.

The commissioners' decisions, taken together and viewed from a non-partisan standpoint, will be found to follow very nearly a middle ground between the rights of the consumers and the rights of the companies; but as is usual in such cases, neither side has been satisfied, and there has been a constant agitation in the legislature to harass the board and the companies. This led in 1894 to the passage of a law prohibiting the members of the commission from carrying on any other business, a provision which does not apply to any other board in the Commonwealth, and this prohibtion was unaccompanied by any increase in salary, although later the salaries of each of the members was increased by $1,000 a year.

EDUCATIONAL VALUE OF COMMISSION.

During these fifteen years a large number of special reports have been made to the legislature from time to time at its request, and besides those which have already been mentioned there was a special report on electric meters in 1895, one on accidents in 1897, and the same year one on the explosion in the subway in Boston.

In 1880 a law was passed limiting the amount of carbonic oxide in illuminating gas to ten per cent. This low limit prevented the use of water gas, and rendered companies using it subject to a fine when the gas was found to contain more than ten per cent. A long agitation followed, and in 1888 the law was so modified that the gas commissioners might grant permits to gas companies to use gas containing a higher percentage than ten, but the law was worded in such a way that the commissioners did not see their way clear towards granting any such permit and they so reported to the legislature. In 1889 they made an elaborate report on the comparative cost of water gas and coal gas, and the relative danger to life of the two gases. This was followed the next year by a repeal of the ten per cent carbonic oxide clause, and since 1890 the manufacture of water gas has become general.

The commissioners have called the attention of the legislature to the doubtful legality of foreign companies holding franchises in the streets in Massachusetts, and although nothing has been done towards defining the rights of foreign companies in the streets, all of the foreign companies which held franchises have been converted into Massachusetts corporations.

The law of 1887 allowed the commissioners to authorize gas companies to furnish electric light, and within the next four years

this authorization was granted to twenty companies and one company was refused the right. This last case occurred in one of the larger cities of the Commonwealth, where both the gas and electric light company were doing a profitable business, and where the competition of one with the other was no injury to either company, and it was not considered advisable, although both companies asked for it, that this consolidation should be allowed.

Under the law which gave a right of appeal to the board by the established company against a new company, twenty two appeals have been taken from the decision of local authorities, and in each case the existing company has been granted the monopoly. Since 1895 no such case has come before the board.

The feature in the law providing for the compulsory supply of gas or electric light on an order from the board, has in only a few cases been used to the extent of the issuance of an order, but a great many cases brought before the board have been settled by its mediation. The law passed in 1891 in relation to the ownership and operation of lightning plants by municipalities required the commissioners to collect returns from these towns in the same way as they do from companies, and to prescribe uniform bookkeeping methods for them. It also provided that in the event of a town being desirous of selling light, it has been allowed. A second petition from the town which is already selling gas at less than cost, requesting to be allowed to sell at a still lower rate, has been refused on the ground that the plant was not to be run entirely in the interests of the consumers, but in the interests of the taxpayers at large.

DEFECTS IN THE SYSTEM.

The powers of the gas commissioners over voluntary associations and foreign companies is, by the statutes, limited to their relations with the consumers, and the size of the capitalization and those doings of the corporation which do not directly influence these relations are beyond their control, and the legislature has yet taken no steps towards restraining these voluntary associations, which are corporations in everything but name. The attention of the legislature has been repeatedly called to the condition of affairs in Boston, and to the evils of watered stock and over-capitalization, beginning with the very first report of the board made in 1886, and continuing up to the present time, and much of the law of 1894

was based on the statements made by it. A remedy is badly needed.

The law requires that all violations of law should be reported to the attorney-general for action, and this has been done a great many times. In most cases it was possible for the attorney-general to secure compliance with the law without actual application to the courts, but the law in relation to the power of the commissioners to over-rule the permits of a local authority in allowing the running of wires over streets was decided in the supreme court, and the commission law upheld. In two cases illegal issue of stock in the form of a stock dividend was stopped, and in another case an attempt to evade the prohibition of stock dividends by the issuance of interest bearing scrip was stopped. A great many companies have been reported for violation of the laws in relation to quality of gas, and for minor matters, and one was reported for making incorrect returns.

Recommendations made repeatedly by the commission allowing them to prescribe forms of keeping manufacturing accounts in the same way as they prescribed forms of bookkeeping under the first statutes, have been ignored by the legislature.

SUMMARY OF EXPERIENCE.

Taking the work of the board all in all, and viewing it judicially, it must be admitted that its general effect has been in the interests of the consumers. It is generally felt by the companies that on matters of price it has too little regard for the investors and is too favorably inclined towards the consumers; and it has been for the interest of agitators for municipal ownership and operation to seek to convey the impression that the board has been unduly favorable to companies.

Certain principles have undoubtedly been established by this Massachusetts form of control:

1. That it is essential to a proper control of the business that accounts should be kept in a uniform way, and that a certain amount of publicity, not so much as is desired by the agitators, but sufficient to show the standing of the companies, should be given, and this has been done in the annual reports.

2. That where one company is giving reasonably good service, the remedy for any fault in the service is not to be found by the

admission of another company, but rather by regulation of the price and service of the existing company.

3. That the spirit of the law allows only the issuance of capital for actual property, and in many of the decisions upon applications for additional stock and bond issues made by companies, this principle is clearly and carefully laid down. The same is true in decisions affecting the price of gas and electric light.

4. That it is against the entire spirit of the laws that foreign corporations, domestic corporations or voluntary associations should be allowed, by ownership of the stock of companies under the control of Massachusetts laws, to issue securities without limit.

Much of the feeling that the work of the commission has not been effective in curing evils has been fostered by the condition of affairs in Boston, but this was a condition which the commission found in existence on its organization, and which it was impossible to reach by any act of the board or any new legislation, although it has been hastily assumed by the public and by some of the more radical students of this problem, that it lies within their powers. Added to this difficulty there has been the reluctance of the attorney-generals for one reason or another to bring before the courts cases in which there was any doubt as to the powers of the state, so that several of these points which might possibly on judicial determination have been decided to be within the power of the board as representing the state, have never reached final adjudication.

While not in every respect an unqualified success, there can be no question in the mind of any unprejudiced observer that even with the obstacles thrown in its way by promoters who desire greater freedom in the issuance of capital and by agitators who are desirous of securing municipal operation of lighting plants, and even with the political agitation involved in much of the gas question in Boston, the method of control adopted by the Commonwealth of Massachusetts has been distinctly one of advantage to the consumer, and not detrimental to the interests of honestly invested capital.

GAS LIGHTING IN GREAT BRITAIN.

By Milo Roy Maltbie.

[Note.—The statistical data used in this study have been taken from official sources and in many cases have been verified from personal knowledge. The Board of Trade returns—the most valuable and complete of all official reports upon the subject—give data for both public and private plants, which are distributed as follows:

Scotland	41	municipal	and	3	private	plants.[1]
Ireland	7	"	"	9	"	"
England and Wales	174	"	"	427	"	"
Total	223	"	"	439	"	"

The unusually large proportion of public works in Scotland will not disturb our generalizations, for the works are distributed very uniformly over each country and through every class of cities. The only fact to be noted is that a larger percentage of the small cities have private works than of cities of larger size. However, this is counterbalanced by the fact that London's supply is in private hands.

As a check upon conclusions derived from these figures, the writer has taken all the cities over 50,000 in 1891, which are equally divided between public and private ownership, and has prepared separate computations.[2] These 62 plants are distributed according to population—census of 1891—as follows:

Population.	Municipal.	Private.
250,000	5	3
150,000—250,000	5	4
100,000—150,000	4	6
75,000—100,000	5	6
50,000— 75,000	12	12
	31	31

Owing to the fact that 10 out of the 17 towns over 150,000 population have public works, municipal operation has a slight advantage in some lines over private management, but due allowance has been made in all deductions.

Conclusions based upon data from a large number of plants are more apt to be correct, and therefore I have usually given more weight to the returns from the 661 public and private plants than from the 62. In many cases, statistics are given herein for a few years *only*, to avoid an endless array of tables; but in every such instance, the data have been worked out for other years and fully support the conclusions stated.]

[1] There is never more than one plant in a town, except in London; but as municipalities and private companies often supply areas beyond the limits of the boroughs or the town proper, the number of local areas supplied is often greater than the number of plants. Salford, for example, supplies some 20 townships outside of its own boundaries. These areas are usually suburban areas, and thus one may say that there are about 232 *urban centers* having municipal supplies and about 439 having private supplies.

[2] London is omitted because peculiar local conditions make its position anomalous. Rhondda has been dropped from the municipal list and Merthyr Tidfil from the list of private companies, because the plants are so small as not to be representative instances. Leyton—population 63,000—is also not included because it is impossible to differentiate the data for that town.

In all urban centers, the use of gas has become a necessity. The oil lamp, which long served so well, has retired to country homes and small villages; not so much because it is less efficient or more expensive than gas, as because higher standards of living declare it *passé*. Electricity upon the other hand has not been able to displace gas because of its higher cost, especially since the newly invented incandescent burner has so greatly improved the illuminating power of gas. In the homes of the wealthy, electricity will come more and more into use, but unless unforeseen inventions revolutionize the manufacture and supply of electricity, gas must continue to be the illuminant used by the majority of urban dwellers.

The influence of light upon social and economic conditions has often been noted. The affinity between evil deeds and darkness was chronicled long before city officials discovered that one street lamp is as effective as several policemen. The moral tone of a locality increases in direct proportion to the amount of light it has. Even the most vicious neighborhoods can be made more law-abiding by extensive use of gas and electricity.

But more! Tenement-house commissions and social-settlement workers bear testimony that personal appearance deteriorates, that filth increases where light—natural or artificial—is bad. Let in the sun-light, or substitute a chandelier for a single flickering gas jet. The dirt and filth become evident, and the person is very low down in the scale who will not make some improvement. People do not cling to uncleanliness naturally; but what is not seen, is to a large measure non-existent. Glasgow and Edinburgh light the hallways of tenement houses and find it profitable not only from a moral but from a sanitary and social point of view.

Then, too, bad light directly affects the physical condition of the people, especially of those who are engaged in occupations where the eyes are used constantly, to say nothing of the rapid deterioration in physical strength and vigor of children who do not get abundant light.

Gas as fuel is not yet extensively used, but as the price declines, its popularity and use will grow greatly, thus making a cheap supply a more and more important factor in domestic and industrial economy. Here again the poorer classes need most consideration, for fuel is a larger item proportionally in their budgets than in those of wealthier homes.

The constant growth of urban populations still further emphasizes the importance of a cheap and adequate lighting supply, not merely because the percentage compelled to use artificial light is increased thereby, but also because the *per capita* consumption of gas or artificial light of any sort increases as cities grow in size. In other words, the mere increase in density of population makes it more necessary to use gas and to use more gas. Further, it is well known that all problems of city life become more acute as population concentrates, and so far as a cheaper and better lighting supply aids in their solution, its importance is increased.

These facts make it evident that the question of municipal or private control of the gas supply has not been given undue attention. They point out also that the basis of comparison of the two systems is not only economic but social, and that the problem must be solved by contrasting actual results rather than by *a priori* arguments and theoretical considerations.

Great Britain is the country best suited for such a study; although it is to be remembered that what proves successful in one political atmosphere may not thrive when transplanted to another soil and climate. The superiority of Great Britain as a field of study is due to three facts. *First:* The experience under municipal and private management extends over a long period of years. Even prior to the middle of the century there were several municipal gas works; and by 1882 the number had risen to 148, at present being 222. Private companies, now some 439 in number, have been operating ever since the first of the century. *Second*: The change from private to municipal ownership has taken place gradually, so that one can compare the two systems under almost precisely the same conditions, and by selecting different periods eliminate possibility of error. When comparing municipal and private operation of the same plant, due allowance must be made for the fact that the gas industry constantly improves and consequently that the later system of management has an advantage over that which precedes. *Third:* The number of public and private plants has been for some years so considerable that the aggregate results for each class truly represent the trend of each system. Local peculiarities neutralize one another where there are a large number of works and prevent errors that would arise from comparing only a few. No two are exactly similar, and consequently it has often happened that zealous advocates of municipal or private owner-

ship have often seemingly established their thesis by selecting plants that were in reality so dissimilar as to vitiate all conclusions.

VARIED EXPERIENCE OF BRITISH TOWNS.

Great Britain has tried almost every conceivable method of managing the gas supply. At the very first, the same principles were applied that obtained in other industries—private ownership unrestrained. This soon proved unsatisfactory, and some sort of public control was everywhere inaugurated, appearing of course in some cities much earlier than in others. Gradually this control was elaborated and strengthened. In many instances, public control gave way to public ownership.

The movement for municipal ownership did not become widespread until after the middle of the century, but a few public plants even antedate 1840, *e. g.*, Manchester-1807(?), Greenock-1830, Beverly-1822 and Keighley-1824. Since 1882 (the first year for which complete returns are available), when there were 148 municipal plants out of a total of 500—29.6 per cent—municipalization has been slowly gaining headway. At present 33.9 per cent are municipal; and this percentage would be much larger if the process by which plants are municipalized, was not so difficult and expensive. To understand the prevalent satisfaction with municipal operation, it is necessary briefly to trace its development and to compare results under each system.

I.

PUBLIC CONTROL.

The illuminating power of gas has been known for centuries, but the first British company was incorporated less than a century ago, when it was found that the development of the industry could not proceed without the formation of companies with limited liability. To secure this power, an act of Parliament was necessary.

In 1810, "The [London] Gas Light and Coke Company" was incorporated "for making inflammable air." The Act[1] authorized the Crown to grant corporate powers by charter, limited the stock to £200,000, and expressly withheld the power to borrow money. Gas could not be supplied outside of the "Cities of London or Westminster and the Borough of Southwark." Upon the demand

[1] 50 George III, c. 163.

of any local authority within this area, the company was required to supply for public lighting a stronger and better light and at a cheaper rate than paid for oil. Other restrictions were imposed to prevent fraud, laying of mains without consent of the local authorities and the formation of a monopoly. The charter was to expire in 21 years, but the company's powers from time to time were extended and enlarged.

Although the whale-oil industry feared its new competitor and strongly opposed the formation of gas companies, others were soon started both in London and in provincial towns.[1] Whenever an *incorporated* company was formed, recourse was had to a special act of Parliament; but a number of companies supplied gas without corporate powers, as local authorities were supposed to have power to permit the laying of mains in streets without special authorization by Parliament. This question was finally tested in the courts which decided that a specific grant was necessary. As a result, almost every company was compelled, sooner or later, to secure a special act.

LEGISLATIVE SUPERVISION UNSATISFACTORY.

This system of granting powers by special legislative act developed several objectionable features. The expenses for printing, witnesses, fees and legal representatives often reached many thousands of dollars. The Parliamentary committee to which the bill was referred spent months in preparing a report. More important matters were deprived of the consideration they deserved.

In 1847 the plan was hit upon of passing a "clauses act." Parliamentary committees had come largely to agree upon what should be inserted in company bills; thus many sections were identical. These were incorporated into the "Gas and Water Clauses Act, 1847,"[2] which was made a part of a gas company's bill simply by citing the title. The result was a great decrease in expenses, time consumed in debate and interference with legislative work. Acts which in 1846 contained over 200 clauses were reduced to 40.[3]

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[1] According to Richards, "*A Practical Treatise on the Manufacture and Distribution of Coal Gas*, London, 1877, page 80, about 200 works had been constructed b 1829.

[2] 10 & 11 Vict., c. 15.

[3] Down to 1885, over 1000 gas bills had passed Parliament, and 60 of these applied to the Metropolis alone. Clifford, *Private Bill Legislation*, 1:221. Most of these were passed before provisional orders came into so general use. See pages 543 and 544.

This Act is of chief interes there because it shows what control had developed and what restrictions had come to be included in the multitudinous special acts up to 1847. It contained many regulations as to the laying of mains, as to the manner, time and place of making gas, as to the prevention of public nuisances, as to injuries to meters and pipes, recovery of rents, etc., and authorized local authorities to issue ordinances safeguarding public interests. But the only direct public control of importance was contained in the clause limiting profits to ten per cent unless otherwise authorized in the special act.[1] If a dividend fell below this maximum, the deficiency could be made up in subsequent years. A reserve fund up to one-tenth of the nominal capital could also be created out of profits, but all profits beyond these amounts had to be used to lower gas charges.

The Act of 1847 was not of universal applicetion, and bills were enacted which did not contain these provisions. But it shows that even at that early date, unrestricted private ownership was considered unwise and had largely been abandoned. During the next twenty years the demand for more rigid public supervision grew stronger, resulting in the passage of the Acts of 1870 and 1871, which with the Act of 1847 constitute the basis of the present system.

PRESENT METHODS OF GRANTING FRANCHISES.

The method of granting corporate powers has been simplified greatly since the early part of this century. There are now Companies Clauses Acts which regulate the formation and operation of joint-stock companies, and the interests of the stockholders as well as of the public are much more carefully safeguarded than with us. To lay mains and operate works in a given locality, the company must secure power either by a provisional order or a special act of Parliament. In the former instance, an application is made to the Board of Trade, which must first ascertain whether the local authorities in whose district the company wishes to operate will give their consent. If they refuse, the Board of Trade may proceed without it, but the reasons for so doing must be reported to Parliament.[2] In practice, the desire of the local authorities is seldom disregarded, and not infrequently they take advantage of

[1] Dividends of gas companies were first restricted in 1841 by a private act. Clifford, 1: 228.

[2] 33 & 34 Vict., c. 70, § 4.

their power to have inserted in the provisional order conditions more or less favorable to the public. The company must submit full and complete plans, and every phase is carefully gone into, final conclusion being reached only after the most thorough examination and the widest opportunity for everyone to be heard. If the Board of Trade decides to issue a provisional order, it is drafted, not by the company or its attorneys, but by the Board itself, which has power to insert or strike out any provisions it desires, not contrary, of course, to existing statutes.[1] A bill is then introduced into Parliament by the Board making the provisional order law; and if unopposed, as is usually the case, it is enacted without further consideration. If opposed, it is referred to a select committee which goes into the whole matter carefully. Its conclusion is usually accepted as final. In most instances the Board of Trade is upheld and very, very infrequently is there any substantial change made in the provisional order.

When the company prefers to proceed by special act, the procedure is different, but the practical results are the same. After the standing orders have been complied with, the bill is referred to a committee, before which the friends and opponents of the measure appear. Everyone is heard, and the most exhaustive inquiry made. The bill is then reported to the House, which adopts without much debate usually the conclusion of the committee. Throughout the entire procedure, the committee, although composed of members of Parliament like our legislative committees, lays aside all party politics and acts more as a judicial body. Although the wisdom of its action is sometimes questioned, not frequently however, its fairness and honesty are never challenged.

The practical results of the two methods do not differ greatly. The Parliamentary committee is more inclined to be lenient with the companies than the Board of Trade, and it is the general feeling that an administrative authority is better suited for the work, except where general policies are to be determined, than a legislative body. But after all, it is the spirit which pervades the system rather than its form which produces such satisfactory results.

GENERAL SCOPE OF SUPERVISION.

At present the local act or the provisional order, as the case may be, limits the area within which gas may be supplied, states

[1] 33 & 34 Vict., c. 70, §§ 5–7.

the purposes of the company, its capital and the conditions upon which shares may be issued, fixes a maximum rate of dividend and the initial figures in the sliding scale, gives orders how any excess shall be used, names the conditions upon which money may be borrowed and the total amount (usually about one-fourth of the capital stock), prescribes the candle power of gas, the pressure and the method of testing, specifies how, when and where directors' meetings shall be held, the qualifications of directors, the method of selection, the powers to be exercised, etc., incorporates the clauses acts relating to the formation of companies, the purchase of land (similar to our power of eminent domain) and the operations of gas companies (the general laws), etc., etc. The grant of power is perpetual; that is, the franchise can be terminated *only* after a special act has been passed by Parliament.[1] No special compensation is paid the central or the local government, the object being to get as good service and as low prices as possible. What the practical results of these provisions are, we shall now see.

LIMITATION OF DIVIDENDS.

The earliest instance of stringent public control over private gas companies was the fixing of a maximum rate of profit. By 1847 it had become quite general although not universal. As the demand for public control grew stronger, it was more and more frequently adopted, and since 1870, when provisional orders were first provided for, very few companies have been given franchises or permitted to increase their capital, that have not been obliged to submit to this supervision. Thus at present, hardly a single company possesses the right to declare unlimited dividends.

In the meantime the maxima have been lowered from ten per cent—the prevailing limit in the first half of the century—to 7½, 7, 6, 5, 4 and even 3½ in one or two instances of most recent date. This is due to several causes. At first, the industry was largely experimental, capital was shy and the average rate of profit in other industries much higher than at present. Ten per cent was considered, therefore, a reasonable limit. When the industry was placed on a firm basis and profits became reasonably certain, capital was more easily secured; and with the decline of the average

[1] Upon this point, gas (and water) franchises differ from electric lighting and street railway franchises. The latter may be terminated by the local authorities at certain specified intervals.

rate of profit in all industries, ten per cent came to be considered too liberal.[1] Thus, established companies which have been given power to increase their capital stock at different times declare dividends varying from 10 to 4 per cent on different issues, the precise rate often depending upon the date when the stock was issued.

The efficacy of such control depends upon the power over stock issues. This was not fully perceived at first. Parliament had guarded against one method of evasion by prohibiting the payment of the maximum dividend upon stock not fully paid in, but said nothing about converting loans into share capital, or selling new stock to shareholders at a price much below its market value, thus increasing the capital upon which dividends might be declared much beyond the amount actually invested. These loopholes were soon discovered by the companies and made use of. In 1872–3, conversions of loans into stock were prohibited, and about the same time clauses began to appear in special acts and provisional orders requiring that all new capital be sold at public auction. At present, if the stock sells above par, the premiums cannot bear dividends, although the money thus received is invested in the plant and thus increases its earning power.[2]

These restrictions have been in a measure successful—very much so as compared with our free and easy ways of permitting companies to do as they please. But it is extremely difficult to prevent evasion, and experience has developed certain weaknesses that must be guarded against. Capital stock should always be kept equal to the present cost of the plant less depreciation, otherwise dividends are declared on what is practically watered capital. But this is extremely difficult of accomplishment. A construction company, composed of the same persons controlling the operating company, may be organized and given a contract for building the plant at an enormously high figure. The persons interested are not injured by this trick, for what comes out of one pocket goes into the other. The construction company cannot be reached, as

[1] In fixing a limit the central government considers all factors and permits higher profits when the risk is greater. Thus 10 per cent is still a common limit for a small part of the stock while 7 and 5 per cent are the maxims on other portions.

[2] Of course those companies to which powers were granted before the introduction of this rule are not bound by it, but whenever new issues are authorized, this condition is imposed.

there is no limit to its dividends; and the nominal capital of the gas company comes to be much above the actual investment.

Even after the construction period has passed, it is very difficult to keep capital and present value on a par. The plant deteriorates, and if an ample renewal fund is not created to replace worn-out machinery and mains, or if capital is not written off, the capital stock soon exceeds real value. Experience has shown that companies very rarely write off capital or provide adequate renewal funds. When new works are needed, more stock is issued, the nominal value being increased by so much. Parliament has tried to prevent this method of evasion. When a bill is introduced for an increase of capital, it strives to apply the economic principle that capital should equal present cost less depreciation, but has not been entirely successful.[1]

A similar difficulty arises when bonds are issued, for if the capital stock is equivalent to the market value of the *plant*, the bonds, being in excess of this amount, are practically watered capital. Parliament now refuses to permit the issue of "debenture stock"—bonds—to exceed in amount one-fourth of the capital stock and limits the rate of interest that may be paid. When all companies are placed upon the same basis, no one is treated unfairly; but if in any way the stock and bonds exceed present value, the maximum rate of dividend is made less restrictive than it seems.

Further, the question of what is a fair profit is a relative one; it depends upon several elements which are very difficult of definite measurement, and which vary greatly from place to place, and from decade to decade. A universal, fixed limit is, therefore, very unfair. The recognition of this fact led to the attempt to obviate the objection by reducing successively the rate from 10 to 4 per cent. However, Parliament has usually lagged so far behind as to give the companies ample freedom. The limits have not greatly restricted them, and the provision permitting them to make up back profits for years when they fell below the legal maximum, no matter how long past, has given them still more leeway.[2]

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[1] *The Report from the Select Committee on Metropolitan Gas Companies*, 1899, calls attention to this difficulty and recommends that obsolete and unproductive capital be redeemed by sinking fund or otherwise.

[2] Firth, *Municipal London*, 1876, p. 357, cities an instance where a London company declared dividends of 40 per cent in 1864 and had a good surplus left over.

Again, if there is no control over expenditures, the law may be evaded by paying high salaries [1] or in other ways charging as expenses of operation what really ought to be included in profits.

The plan is open to the further objection that it tends to retard the introduction of improvements and to check personal effort, unless the limit is so high as to be practically useless. For when the limit of profit has been reached, there is no incentive to introduce new processes. No advantage will acrue; dividends cannot be increased; consequently the plant is allowed to run along as it will, until its deterioration so increases the cost of production as to reduce dividends below the maximum. The very great importance of this factor is more fully appreciated when one remembers that direct competition does not exist; hence all the more need of other incentives. Thus one is caught between the horns of a dilemma; to fix a high limit renders the plan worthless, and to fix a low limit retards progress and injures both the consumer and the public.

One is now led to ask: What benefit *is* derived from the limit upon dividends? Very little where the sliding scale has not been introduced. The purpose of the law is shown by the requirement that when dividends reach the maximum, the price of gas shall be reduced.[2] But from the point of view of the company, there is no advantage in reducing the price of gas. Profits cannot be increased, but expenses are greater owing to increased consumption. And if occasion should arise for restoring prices, the general opposition stirred up would be a troublesome factor. Thus there is every incentive to use up in some way all profits made, and none whatever to reduce prices. Evidently the company is the loser when once the limit is reached, and the consumer gains nothing. This probably accounts for the fact that only in a few instances were prices compulsorily reduced before the introduction of the sliding scale.

MAXIMUM PRICE OF GAS.

The very first act passed by Parliament fixed the maximum price which could be charged for gas for public lighting, but left the private consumer to shift for himself. It was thought

[1] In one case, director's fees were ordered limited to $50,000 annually, the maximum being placed at $80,000. See Firth, *op. cit.*, p. 869.

[2] The company is allowed to accumulate an insurance fund equal to one-tenth of the capital stock from which unusual expenses may be paid, but after that all the surplus must go to reduce prices.

that competition either between different companies or different commodities would prevent unreasonable charges and monopoly prices. The Gas Works Clauses Act of 1847 shows that even by that date maximum prices were not generally fixed in private acts. That the plan had become quite common by 1873 is evidenced by an act of Parliament authorizing a temporary increase of existing maxima, owing to the "unusual increase in the cost of production gas."[1] At present, all companies are subject to some limitations, only eight, according to the return for 1899, being entirely free. Of the remaining 431 companies, 25 have fixed maxima, and 186 are operating under a sliding scale, according to which dividends may be increased when the charge is reduced below a certain price. Nine companies have both a fixed limit and a sliding scale.

The fixed maxima vary from 3s. 4d. per thousand cubic feet, as in the case of Newcastle and Tynemouth, to 10s. 6d. in Sligo, Ireland. Those most common are from 4s. to 6s.

The objections to a fixed maximum price are similar to those urged against limited dividends. The gas industry is a progressive industry; the cost of supplying gas constantly decreases; and a once restrictive limit soon loses its value. Ten shillings was none too high in 1820, perhaps, but in 1900 it is entirely out of range. It becomes necessary, therefore, to reduce the limit to keep pace with new processes and changed conditions.[2] There are only a very few, if any, instances in which any department of the central government outside of Parliament, has this power, and Parliament usually fails to act until a company comes before it asking for further powers or authority to increase its capital. This is a very tardy method of applying a remedy, and it is so difficult to ascertain what would be a fair price that the government usually errs in allowing a too wide margin. The difference between the maxima and the prices actually charged is often considerable, and while in some instances this control may seem to restrict the companies, it usually permits ample freedom and seldom prevents

[1] 36 & 37 Vict., c. 89, § 7.

[2] Mr. Sidney Webb, in *The London Program*, p. 48, says: "The enormous rise in the receipts from the sale of residual products, which do not enter into the sliding sca e has greatly increased the shareholders' income. A rate for gas which formerly would have yielded eight or nine per cent now yields thirteen."

the companies from making generous profits. The acts at first said nothing about meter rents, and the limits upon prices were evaded by charging high rents for meters. This is now prevented by limiting meter rents also.

Due allowance being made for these weaknesses, it must be said that limiting the price of gas is much preferable to *laissez faire*. However, it fails to furnish an adaquate means of control; and the recognition of this fact led to the invention of the sliding scale, which first came into general use in the seventies,[1] and has since largely superseded fixed limits for both charges and profits. Over 40 per cent of the companies are operating under it, and in time the old methods will be displaced entirely. The plan is to fix an initial price of gas and of rate of dividend, and as the price is lowered, to allow the rate to be increased. Recent statutes usually provide that a decline of 1 d. (2 cents) in price gives the company power to declare a dividend of one-fourth of one per cent above the initial rate. The acts vary considerably, of course, as to the initial amounts, those most common are from 4s. to 5s. and from 7 to 10 per cent. Just now there is a strong tendency to reduce both the initial price and the initial rate of profit.

This plan of uniting lower prices with higher dividends is far superior to that of limiting either separately. It has to encounter all the difficulties of keeping capital and present value of plant equal, expenses within proper bounds, and maximum prices and rates of dividends sufficiently low to be efficacious when the rapid development of the industry reduces cost of production, and yet sufficiently expansive to conform to varying conditions. It does, however, avoid one difficulty quite successfully; there is an incentive to progress as rapidly as possible, for progress lowers prices, which permits dividends to be increased.

QUALITY OF GAS.

Whether a given price is reasonable depends very largely upon the quality of the gas, and it is very easy to evade a limit upon price by giving a poor quality. British legislators saw this plainly. Whenever a maximum price was fixed, candle power and pressure were also prescribed. Thus practically all companies must furnish

[1] The first instance of its use was in 1855. The Parliamentary Commission which reported on the Metropolitan Gas Companies in 1859 recommended it, but it was rejected. In 1874 the Board of Trade endorsed the principle, and it became quite common thereafter.

gas of a minimum candle power. These restrictions are not very severe, the usual requirement being 14 or 15 candles, the extreme limits being 10 and 25; but some good is accomplished. It is to be noted, however, that gas experts are not united as to whether high quality and high price are preferable to low quality and low price. Local conditions must determine which combination is better. For example, where large quantities of gas are used as fuel and where there is only one set of mains, low quality and low price will be most beneficial. But where coal is expensive, enriching material cheap and gas is used entirely as an illuminant, high candle power and high price will probably be most advantageous. Now if the restrictions imposed do not conform to local conditions, the highest utility of the industry may be prevented. As a matter of fact, very little harm has been done in this direction.

MINOR REGULATIONS.

Besides the foregoing, there are many other provisions giving the central and local authorities some control. If the works are not begun within one year and fully completed within three years after authority is conferred, the franchise becomes null and void, unless the Board of Trade extends the time.[1] Local authorities appoint inspectors to examine meters, pipes and works, and to test gas.[2] Ordinances are issued regulating the laying of mains, the repaving of streets, the manufacture of gas, etc. Complete returns, showing in detail financial operations, must be sent to the local authorities and the Board of Trade, which specifies their form and the facts to be given.[3] These reports are published annually, and are invaluable to the legislator, the public official and the citizen, making possible just and wise legislation.

PURCHASE OF WORKS.

Indirectly, private companies are somewhat restrained by the fear that general indignation may lead Parliament to authorize compulsory purchase.[4] Having unlimited power, Parliament can

[1] 33 & 34 Vict., c. 70, § 11. [2] 34 & 35 Vict., c. 41, §§ 29 and 30. [3] *Ibid.*, § 35.

[4] This method of control is not nearly so strong in the case of gas companies (and water companies) as of street railways and electric lighting plants where a general law empowers the local authorities to take over the undertakings at certain specified times without waiting for the consent of the companies, paying them the present value of the works exclusive of all franchise values, payment for good-will or prospective profits. This difference is due largely to the fact that the gas (and water) industry had become

do this regardless of whether the acts originally provided for purchase either compulsorily or otherwise, but it seldom exercises its authority, unless there is considerable provocation. It has great respect for vested interests.

In Scotland, the local authorities—the commissioners of police—were given power in 1876 to buy out, whenever they chose, any company "not incorporated by act of Parliament or authorized by provisional order,"[1] a provision which at that time made every company except the Edinburgh company liable to purchase.[2] Since that date very many companies have been bought out; only three private plants now remain, and these have acts of Parliament or provisional orders so that they cannot be reached except through special authorization, as has always been the case—in England, Wales and Ireland. Thus even in Scotland, this control, once quite effective, is no longer applicable.

In most instances, an agreement is reached between the company and the municipality, and the bill passes without much opposition. When the price alone is in dispute, arbitration is resorted to, which is also the method of determining the compensation in case of compulsory purchase. But whether by agreement or arbitration, the town has to pay at least the full market value of the undertaking, including the value of the franchise, good-will and prospective profits, so far as these elements are reflected in market values. This means that franchises *given* to private companies have been retaken only after paying a good round sum. This is the penalty for failing to insert purchase clauses in the grants to private companies and for permitting franchises to run without limit.

Occasionally, the companies have driven a hard bargain by permitting the plant to run down, by allowing nothing for depreciation and by turning every receipt into dividends, thus inflating the market value of the stock. Just before the collapse came, an offer would be made to the municipality to take over the works. The authorities and the public, anxious to secure the advantages reaped by other towns, have swallowed the bait, awak-

firmly established before the movement for municipalization became so strong. Indeed, it took almost half a century to prove that competition was wasteful and impracticable and nearly thirty years more to demonstrate that municipal operation ought to be made as easy as possible.

[1] 39 & 40 Vict., c. 49, § 20. [2] Silverthorne, p. 11.

ing to find that although the price paid was perhaps very reasonable as compared with the market value of the stock, it was much above the real value, and that an extended system of repairs and reconstruction would soon be necessary.

Prior to 1872, the towns were able to get better terms than at present by threatening to establish competing plants. The private companies considered this unfair and secured the passage of an act prohibiting the payment from public funds of costs of promoting bills to authorize new municipal plants when privately owned plants existed.[1] These legislative expenses are so heavy that the act has put an end to this scheme.[2]

The relative importance of these various methods of securing control of gas undertakings is shown by some figures in Silverthorne's work, *The Purchase of Gas and Water Works*, 1881, pages 32–59. Of the 58 municipal plants concerning which facts are given, 37 were purchased by agreement (probably most of these by local act, as provisional orders had not yet come into general use), 4 were secured by arbitration, 3 by compulsory purchase, 1 "semi-compulsory," 7 through the threat of establishing competing plants and 6 were built originally by the local authorities.

ELIMINATION OF COMPETITION.

The comprehensive system of public control above described was only secured after several decades of experience, in which it became evident that the gas industry tended to become a monopoly, that a monopoly was dangerous to public interests, that it would be beneficial both to the public and to the companies if competition were eliminated and private companies placed under public control.

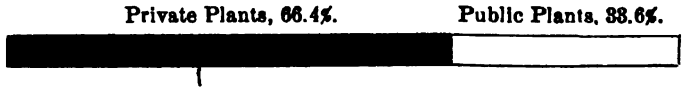
The history of the London gas companies shows most clearly the bad effects of competition and the way public control dedeveloped, although every provincial town of any size has passed through a similar experience.[3] In the first half of the century, competition was encouraged. Companies were organized which

[1] 35 & 36 Vict., c. 91, § 2—Borough Funds Act.

[2] In 1876 some of the London companies were forced to accept new limitations on dividends by the threat of the City Corporation to establish a competing municipal plant. Webb, *The London Programme*, p. 51.

[3] See Richards, *A Practical Treatise on the Manufacture and Distribution of Coal Gas*, from which the following facts are taken.

ought to be granted. Current expenditures may be too high in a few instances, but the law is not frequently evaded in this direction. Public control has not retarded the development of the industry, and it is almost as progressive where the sliding scale is not used as where it is, for the limits upon dividends usually allow ample margin. Prices are usually lower under the sliding scale, and the industry more economically conducted. Public control is undoubtedly superior to *laissez faire*. Nevertheless, many towns have gone further and have municipalized their gas works. It is necessary, therefore, to contrast the results under public control and under public operation, and to ascertain which system is preferable.[1]



II.

MUNICIPAL *vs.* PRIVATE OPERATION.

PRICES LOWER UNDER MUNICIPAL OPERATION.

The question of price usually attracts attention first, although it is not the most important factor. The varying scales of prices and discounts make it impossible to determine by direct comparison whether public or private plants charge less. Dividing total receipts by the number of thousand feet of gas sold, during 1898, one gets a quotient of 3s. 6d. (86 cents) in case of private and 3s. ½d. (75 cents) in case of public works. This quotient is not the average price in either instance, for total receipts include receipts from the sale of by-products, rents of meters, stoves and fittings, public lighting, etc. From a close examination of the financial statements, however, I am positive that receipts other than from the sale of gas are practically the same in relative amount, except that a number of towns make no charge for public lighting,[2] and that most towns charge less for meters and fittings than private companies.

[1] One might conceive of municipal *ownership* and private *operation*, but I know of only one such instance—Newbury—cited by Silverthorne, *op. cit.*, p. 56. This system is very difficult of practical adjustment, and most cities that have gone so far as to build a plant advise its operation as well. I have omitted all discussion of the system, as generalizations from one instance are untirely unsafe. Doncaster tried to combine public and private interests in one company, but this was given up in a few years for municipal operation.

[2] Municipal plants supply free of charge 8.5 per cent of all public lamps lighted.

These elements might reduce somewhat the difference of 11 cents in favor of municipal operation, but relatively they are not important. After making due allowance, it is safe to say that municipal gas is sold upon an average 7 or 8 cents less per thousand cubic feet than gas furnished by private companies. This may seem a small difference, but upon a total consumption of 47,283,759,687 cubic feet, it means an annual saving of $3,300,000. Compared with the actual average price of gas—probably about 60 and 70 cents [1]—it is considerable, at least ten per cent of the price. The lowest charge was 1s. 4d. (33 cents) in Widnes, a town of 35,000 people having a municipal plant; the highest was 10s. ($2.50) charged by several private companies.[2]

Meter rents are also unusually low under municipal operation. The difference is not so great in the case of ordinary meters as of prepayment meters, which are more frequently furnished without charge to the poorer classes to encourage the use of gas. During 1898 over one-third of the municipal works furnished meters free of charge; only 18 companies did so—less than 4 per cent. Of the consumers supplied by municipal plants, over 62 per cent had meters free; by private plants, 12 per cent. The same is largely true of fittings and stoves, although the authorities have not gone so far in providing these as in the case of meters.

This policy—for it is a conscious attempt upon the part of the towns to make gas lighting as cheap as possible [3]—does not affect the finances greatly. The receipts are reduced somewhat, it is true, and the expenses are increased, but the great social gain which comes from the much larger number of consumers per 1,000 population where there are municipal plants, more than pays for any loss of profits.

QUALITY OF GAS SUPERIOR.

Whether gas is really cheaper under municipal ownership depends largely upon its quality. But here again the advantage is upon the side of the public plants. In 1898–9 the average candle power of gas furnished by private plants was nearly 16.4; by municipal works nearly 18.9—a difference of 2.5 candles, or 14 per

[1] Upon an average, receipts from the sale of gas are 80 per cent of the total receipts. This would give for municipal and private works an average price of 60 and 69 cents respectively.

[2] *The Gas and Electric Lighting Works Directory and Statistics*, 1899.

[3] In four-fifths of the cases, a maximum price is fixed by law, but it has little effect. The actual price is considerably below the legal maximum.

cent. Leaving out of consideration the Scottish towns, which have an unusually high candle-power gas, the figures are 16.3 and 18 respectively—a difference of over 10 per cent. Although a minimum candle power is prescribed by law for public as well as private plants, the superiority of the former is not due to that cause. The usual minimum is 14 and 15 candle power, but the gas actually supplied is 3 or 4 candle power better.

It is also claimed that the pressure is better and more uniform, but I am unable to verify the statement. It certainly is not inferior. In many other ways the character of the service under municipal operation is most excellent. Many towns have agents constantly explaining to the poorer classes the advantages of prepayment meters, gas stoves, grillers, etc.[1] Show-rooms are often maintained where every kind of gasfitting is on exhibition. Attendants willingly explain every feature, and consumers can readily find without running to many stores the latest improvements, the best stove, heater, burner or what not. This phase of municipal trading has been severely attacked, and undoubtedly there is danger that towns will go too far in this direction, but in most instances the beneficial results more than counterbalance any harm done to the small trader.

EXTENSIVE USE OF GAS.

Probably the most striking difference between private and public ownership is to be seen in the number of consumers. Upon the basis of capitalization, receipts, expenditures, coal carbonized, gas sold, etc., the ratio of private to municipal works is about two to one; yet the number of consumers[2] is practically equal; that is,

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[1] The following circular issued by the gas deparment of Salford is an instance of of how a town is placarded.

GAS COOKING

is the greatest luxury you can have in the house.

You can boil or grill at any hour of the day or night.

No coal to fetch, and no fire to build and light.

Always ready for use—no waste.

If you go out early in the morning, or come in late at night, it is ready to cook you a hot meal, or prepare a hot cup of coffee or tea.

Infants' food can be warmed at any time, day or night. Once used, no home is complete without gas cooking.

[2] "Consumers" do not include of course all persons who use gas, but merely the separate accounts as they stand on the books. Thus a family is a "consumer", just the same as a shopkeeper who has a gas-engine is a "consumer."

the per capita consumption of gas under private operation is much greater than under municipal operation, the figures for 1898–9 being 30,000 and 48,000 thousand feet per annum respectively.

This fact does not indicate a disposition upon the part of people in the same social and economic position to use less where the supply is public; indeed, the contrary is true, owing to the cheaper price and better service. What it does indicate is that under municipal operation, a larger number of the poorer classes uses gas. If all the plants were private and conducted upon the same principle as those already in operation, there would be some 730,000 "consumers" less than at present, or estimating five persons to a "consumer," some 3,650,000 persons less. In other words, nearly 25 per cent of the total number of persons now using gas would not be using it were there no municipal plants.

In many towns, practically the entire population is supplied. For instance:

Towns.	Population supplied.[1]	Number of "Consumers."	Ratio of population to "Consumers."[2]
Glasgow	860,000	186,327	4 6
Manchester	655,000	118 958	5.5
Edinburgh	381.000	74.964	5.1
Oldham	220,000	48,174	4.6
Bolton	171.000	37.648	4.5
Halifax	105 000	25,080	4.2
Rochdale	71.401[3]	25 147	2.8
Bury	65,000	11,800	5.5

Comparing the total population with the number of consumers in the 31 towns of over 50,000 population having municipal works with the 31 towns having private plants, one finds:

	Population.	Consumers.	Ratio.
Municipal works	5,528,833	1,115,410	4.9 to 1
Private works	4,752,793	507,169	9.3 to 1

This shows that about one-half the population uses gas where private works exist and practically all the population where there

[1] Except in the case of Rochdale the figures in this column have been taken from *Gas and Electric Lighting Works Directory and Statistics*, 1899.

[2] If "consumers" included only families, one could easily estimate the population actually using gas by multiplying the number of "consumers" by five, there being on an average five persons to each family. But as nearly every meter is counted as a "consumer," and as in some instances a man has a meter at home and another at his store or shop, five is too high. Upon an average, probably four persons to a "consumer" would be a fair estimate. It would depend, however, upon the character of the town. In Rochdale, for example, the ratio is probably less than four, even allowing for a large increase of population since 1891, but Rochdale is a town where small shopkeepers and manufacturers are very numerous. Hence separate accounts are very numerous.

[3] Census of 1891.

are public works. What American city with its boasted superior private management can show such results, even if allowance be made for the more general use of electricity.[1]

This marked advantage of municipal over private operation is not due to mere chance. Prices have intentionally been placed at a low figure; meters, fittings, stoves, grillers, etc. have purposely been offered at low prices or free of charge, and other methods adopted to induce the poorer classes to use gas. Probably one of the most important agencies in this direction is the prepayment meter, for even if fittings and appliances were free, many poor people would find it difficult to accumulate a sufficient amount to pay a month's or a quarter's gas bill. With the prepayment meter they can insert a penny (two cents) in the slot and get from 25 to 35 feet of gas, which will last from five to seven hours.[2] If they do not have the penny, they go without; but according to a peculiar economic law, it is easier to get one penny for each of thirty days than thirty pennies on the thirtieth day.[3]

The importance of the wider use of gas under municipilization can hardly be overestimated. Measure its effect from a social, moral, physical and economic point of view! Estimate the value of a stronger municipal spirit! Who will say that this is not the most valuable asset of municipilization in Great Britain, although it can never be expressed in money terms.

HIGHER WAGES.

The user is not the only person benefited. As a rule, wages are slightly higher and the hours of labor slightly shorter under municipal management, but in neither instance is the difference very noticeable. The principal advantage to the municipal employee is in the way he is treated. Dismissals for trivial offenses are less frequent. Sick and superannuation funds are more often

[1] *The Engineering News* of Jan. 20, 1898, contains statistics for the United States and Canada, but so few Canadian cities are included that the facts practically represent the United States alone. Returns were received from 14 cities having over 100,000 population each showing that 1 person in 12 was a consumer; from 130 cities between 20,000 and 100,000, 1 in 17 was a consumer; and from 280 cities of 20,000 or less, that 1 in 28 was a consumer.

[2] Prices are slightly higher to those who use prepayment meters, but the difference probably does not exceed, if it equals, the added expense of this kind of service.

[3] Manchester in March, 1900, had 31,436 automatic or prepayment meters in use out of a total of 126,191, and in one year had rented 9,560 appliances. Glasgow has over 15,00 toves out on hire.

provided [1], and in a few instances, as at Leicester, special libraries, reading rooms, lectures, entertainments and halls for social gatherings are furnished. The result is a slightly higher labor cost under municipal operation. The difference is not large, and, indeed, cost of production seems to be lower under municipalization than under private management.[2]

One would naturally expect, owing to municipal employment being so desirable, that the spoils idea would be prevalent and the laborers corrupted. Persons *are* eager to secure positions under the town, but as selection is almost always determined by fitness, and as public opinion is strongly opposed to the spoils idea, there has rarely been any prostitution of the service for political or personal ends. Further, there is at present little tendency in this direction. One hears grave fears expressed for the future of municipalization, but even the most pessimistic admit that at present the danger is more imaginary than real. The laborers have not yet exercised the power they possess as voters nor attempted to coerce political parties. Higher wages and better conditions of labor have come as a result of the general feeling that laborers ought to be better treated rather than as a concession to demands made by the workmen themselves. The suggestion is sometimes made that municipal employees be disfranchised. This is a drastic remedy and will not receive much support until the evil becomes more real and until no other remedy seems adequate.

The beneficial result to the municipality of such conditions is that at any time it can secure efficient workmen. A skilled mechanic or an experienced superintendent engages just as willingly to work for a town as for a private company. He knows his position is secure as long as he is efficient, and he is not distrusted

[1] The Birmingham (Gas Department) Sick and Funeral Allowance Society is composed of all the employees of the department, who pay 6d. (12 cents) per week if over 20 years of age, and in case of illness receive medical advice and medicine, and 10s., ($2.50) per week for the first half-year, 5s. per week for the second-half year, and 2s. 6d. per week for the second year of sickness. In case of death £10 ($50) is paid for funeral expenses. When a member is injured at work through no fault of his own full pay is given during sickness. All employees must be members.

The City of Birmingham pays all expenses of the Society, using what is received from members' fees as far as it will go. During 1899–1900, $18,000 were expended.

Besides the funds of this Society, there are pension funds of $115,000 invested in city bonds.

[2] But upon this point see page 569 *infra*.

or disliked because he has worked for a company, or *vice versa*. Not infrequently when an undertaking is purchased, the whole staff is taken over by the town, and the works run on as if no change had been made.

PROFITS.

Coming now to financial considerations, it is first to be noted that the attitude of the municipality towards profits differs greatly from that of the private company. Companies aim to declare as large dividends as possible. Municipalities think more of better service and lower charges than of decreased taxes. Some towns seem even to court a deficit by fixing charges so low that the receipts will barely cover costs of operation, interest, sinking fund and depreciation. But outside of Scotland, where towns are prohibited from using profits "in aid of rates"—to lower taxes[1]—they usually aim to benefit the taxpayers, although the amount is small in most instances.[2]

The present trend of municipalization is setting very strongly away from large profits.[3] When the industry was new, and when public operation was yet something of an experiment, it seemed wise to allow for possible failure, and the amounts carried in aid of rates were considerable, much larger than at present. As it became evident that there was little likelihood of the works ever becoming a burden upon the taxpayers, and as the social value of a cheap gas supply came to be appreciated more, prices were lowered and the margin between receipts and expenditures made smaller; for, they reasoned, if the taxpayer runs no risk of being called upon to meet a deficit, why should he share profits? One may safely predict that "payments in aid of rates" will still further decrease; and before many years, Parliament will probably pass an act requiring that such payments be stopped.

The second important fact is that better service, lower prices, higher quality and more wages have not been secured by incurring

[1] 39 & 40 Vict., c. 49, § 41.

[2] The statement that profits of municipal undertakings are in some instances so large as to make taxation unnecessary is not only false but misrepresents the policy of British towns. Some towns do make a large profit from their gas works, but these are exceptional instances. Manchester in 1899–1900 made a gross profit of over $700,000, and after paying interest and sinking fund charges had $350,000 left, of which $250,000 was paid into the city fund for the general purposes of the city.

[3] The figures for net profits are not given, but gross profits declined from 14.1d (28 cents) per thousand cubic feet in 1883 to 9.2d. (18 cents) in 1898.

a deficit. According to the last return issued by the Board of Trade, the total amount of capital borrowed for municipal gas works was, up to 1899, £28,614,971 ($143,000,000), of which £6,744,715 ($33,700,000) had been repaid or accumulated in sinking funds, leaving an actual capitalization of £21,870,256 ($109,300,000). During 1898–9, the receipts were £7,177,670 ($35,850,000); the expenditures, excluding interest and sinking fund charges but including taxes,[1] £5,365,995 ($26,800,000); and the net profit £1,811,675 ($9,050,000) —or 8.3 per cent. A return issued in 1899 by the Local Government Board shows the same result practically. Eighty-seven municipal boroughs in England and Wales owned gas works with a total *net* indebtedness of £14,720,698 ($73,600,000), and during the five years from 1893–1898 made an average annual gross profit of £1,180,208 ($5,900,000)—or 8 per cent. According to each return there remained to be paid interest at from 3 to 4 per cent, and a sinking fund charge of about 2½ per cent, leaving about 2 per cent to be used to reduce taxes or to establish a reserve fund.

Comparing these figures with those of private companies, as given in the Board of Trade return for 1899, one finds that upon a *share capital*[2] of £44,134,488 ($220,670,000) for all the 439 private companies, a net profit of £3,783,177 ($18,900,000) was made in 1898—8.6 per cent, only slightly more than under municipal operation. As this amount is paid out in dividends, except, perhaps, a very small sum to replace worn-out plant, the average rate of dividend is at least 8 per cent upon the *nominal* capital—about twice the normal rate of interest.

The 62 towns of over 50,000 population show similar results. The average net profit of the 31 municipal works in 1898–9 was 8.9 per cent, with net indebtedness as a base. The 31 private plants made a profit of 7.4 per cent, using share capital as a base.

Taking the amount of gas made as a basis of comparison instead of capitalization, the data for 1898–9 are somewhat different. The profit under public operation was 9.2d. (18.4 cents) per thousand cubic feet; under private operation, 11.3d. (22.6 cents), a

[1] Many writers have made the mistake of assuming that municipal plants do not pay taxes. Such is not the case. Both the central government and the local authorities collect taxes just the same whether the plant is owned by the town or by a private company.

[2] *Loan capital, i.e.*, bonds, is not included, for it does not bear dividends, and the interest paid has already been included in expenditures.

difference of 2.1d. (4.2 cents) per thousand, due to the higher prices of gas, meters and fittings under private operation.

All this evidence shows that the advantages of municipalization described in the preceding pages have not been secured by piling up an annual deficit. To be absolutely sure of one's ground, and that the day of judgment has not simply been postponed, it is necessary to analyze financial conditions still further. First as to capitalization:

CAPITALIZATION.

Most of the municipal plants were not constructed by the towns but were purchased from private companies, which were paid the market value of the undertaking,[1] including the value of the franchise, except perhaps in a very few instances. As gas works have usually been good-paying properties, the purchase price was much higher than the cost of building the plant, and the original capital investment of the municipality was, therefore, larger than the capital stock and bonds of the private company. To squeeze out the water, to write down the capitalization to a normal figure (the present cost of building the plant less depreciation) usually requires some twenty-five or thirty years, for it must be distributed over a considerable period to lighten the burden. Some of the public plants have not yet reached the proper level, but their excess is more than counterbalanced by those towns that have owned their plants for many years, and that have reduced capitalization below the cost of rebuilding the plant. In 1899 there was a total share capital for private works of 12.34s. ($3.08) per thousand cubic feet of gas made, a net capital[2] for public plants of 8.5s. ($2.12) per thousand. In this connection it should be noted that this difference will probably grow greater instead of less, and consequently interest and sinking fund charges will become less and less important items per thousand cubic feet, permitting the municipalities still further to reduce prices, making the showing in favor of municipalization even more favorable than at present.

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[1] As pointed out on page 552 *supra*.

[2] The reader should beware of confusing *net capital* with *capital* value. Net capital means the bonds outstanding less sinking fund—the amount upon which interest is being paid. Capital value is not given in the returns and could not be used therefore, although as a basis of comparison it would be much more scientific than what I have been obliged to adopt.

SINKING FUNDS AND DEPRECIATION.

A more important question is whether through inadequate provision for sinking funds or depreciation charges, the municipal plants have been permitted to run down while fixed charges have remained constant.[1] Let us follow the process and see how the interests of the public are safeguarded in this direction.

Power to purchase or construct gas works must be secured by general act of Parliament, by local act or by provisional order. In any case, unlimited power to incur debt is never given; certain limits are invariably fixed. Sometimes a maximum amount is specified in a local act or a provisional order, to exceed which recourse must be had to Parliament. More frequently there is a general grant of power, subject to the restriction that all loans must be approved by the Local Government Board or some other administrative department of the central government.[2] At first, Parliament was much more lenient than these departments, but of late years it has come more and more to conform to the rule laid down by the Local Government Board, viz., that a loan must be repaid before a new loan for the identical purpose will become necessary. Thus, whether by general law, local act or provisional order, the same result is generally secured.

To illustrate: A town wishes to negotiate a loan for a new gasometer. The Local Government Board knows from past experience about how long a gasometer such as planned will last, and making allowance for depreciation due to new inventions, fixes a term—20 years say—within which all bonds issued for this purpose must be paid; and not until the town has made secure and ample provision for a sinking fund to pay them in 20 years will the Board approve the issue, without which approval they are illegal. If the proceeds are to be used to purchase land, the period

[1] The importance of a sinking fund founded upon a correct principle can hardly be overestimated, for if there is no sinking fund or depreciation account or if the term is longer than the life of the material or the apparatus for which the expenditure was made, the future consumer, or the taxpayer in case a deficit occurs and is defrayed by taxation, pays for something he never enjoys. If, for example, the bonds for a gasometer and the sinking fund to pay off these bonds, are allowed to run 50 years, and if the average life of a gasometer is 25 years, the present consumer would get his gas at less than cost, assuming that charges are based on cost of production. But the consumer a generation hence would be obliged to pay not only the interest and sinking fund charge on the bonds issued to purchase the gasometer then in use but on those issued for the one now torn down and in the junk-shop—a sum double the proper amount.

[2] See 39 & 40 Vict., c. 49, § 18; 38 & 39 Vict., c. 55, § 162—general acts.

is longer, usually about 50 years, for land is always a valuable asset. If a retort is to be built, a short term is fixed. The idea always in mind is that interest and sinking fund charges must terminate with the usefulness of the thing for which the bonds are issued.

This rule is economically sound, and if in actual practice it has been rigidly followed, sinking fund charges have been ample and each generation has been treated fairly. Turning to the reports one finds that such has been the case. In some instances Parliament has let down the bars, but in recent years and in most cases the periods of prepayment have been well within the rule. Indeed, the trend seems to be to make them shorter than necessary, as by so doing the early removal of antiquated machinery and the substitution of new inventions is made possible, thus keeping the plants fully up to date. The period most frequently encountered is 25 or 30 years, and in many cases loans for the purchase of land run no longer.[1] According to the return for 1899, the 87 municipal boroughs owning gas works in England and Wales had paid off, or had sinking funds to pay off when due, 23.5 per cent of the total capital borrowed. The percentage for all public plants in Great Britain and Ireland was 23.6. Considering the short time for which most of the bonds have been outstanding, the showing is very good.

Private companies on the other hand very rarely, if ever, maintain sinking funds or depreciation accounts, or write off capital in any other way. When a new process is introduced, more stock is issued and dividends are declared not only on this stock but on the stock the proceeds of which were used to purchase the old machinery, now of no value and contributing nothing to the income of the works. Under municipal operation, the latter would have been wiped out before the new process was installed, and instead of capital for two plants—the worn-out and the new—there would be bonds outstanding for the latter *only*. This difference will more and more appear the longer municipal and private plants are operated side by side. Unless the companies change their plans they are doomed sooner or later to reach a point when they can not pay a fair dividend or induce new capital to come in.

[1] In Scotland all works purchased of private companies must be paid for in 40 years. 39 & 40 Vict., c. 49, § 40.

Nothing is said in the laws regarding depreciation funds,[1] for if the rule above stated for sinking funds is enforced, there is no need of a depreciation account. The sinking fund is all the depreciation fund needed. To be doubly secure, however, some of the towns set aside a small fund in prosperous years so that in case it seems wise to rebuild or substitute new machinery before there is real need, it can be done without increasing capitalization. The amount is small and hardly worth considering in most instances.

The requirement that loans must be approved by the Local Government Board gives this authority considerable control over other financial operations. When an application is made, the Board inquires into the financial status of the town and will not give its approval until it is satisfied that the finances are well managed. If it finds evidence of looseness, it can bring about a change by insisting upon improvement as a condition precedent to the granting of its approval.[2]

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[1] The only exception is the Burghs Gas Supply (Scotland) Act, 39 & 40 Vict., c. 49, § 41, which merely mentions depreciation and renewal funds and states that they shall be such as to keep the plants under public control in perpetuity.

[2] It is to be noted that in the preceding discussion of financial conditions, nothing has been said regarding the steadily increasing local indebtedness. Zealous advocates of private interests are wont to make a great deal of this fact and to point out in agonizing sentences the dire consequences. They say, and truthfully too, that between 1875 and 1898, the national debt was *reduced* $650,000,000, and the local debt *increased* $850,000,000, the latter reaching the enormous figure of $1,260,000,000. This they use as a text for an attack against municipal operation, trying to make persons believe that the local governments are in the slough of bankruptcy and repudiation. *But debt is no evidence in itself of bad financial conditions*, and an anaylsis of local indebtedness shows the attack to be groundless. Of the entire amount, 19 per cent is for water works, 18 for wharves, docks and harbor improvements, 16 for gas works, electric lighting plants, markets, dwellings, cemeteries, tramways and baths, which are not a burden in any sense, but instead produce a revenue after paying all expenses; that is, almost 50 per cent of the debt is for paying properties. Probably 40 per cent more is for property which could be sold any time for more than the face of the bonds outstanding, *e. g.*, school sites and buildings, parks and open spaces, public lands and buildings, bridges and ferries, etc. One may safely say that less than 15 per cent of the local debt represents liabilities rather than assets. In comparison the national debt will not bear analysis.

Comparing present conditions with those of 1875, the charge becomes still more ridiculous. Less of the local debt now represents unproductive investments, and by municipalizing monopolies, the financial conditions of the towns have become better instead of worse, to say nothing of the social and economic benefits conferred upon their citizens.

RELATIVE PRODUCTIVITY.

Up to this point municipalization has been tested by standards that are individual rather than social, standards that have to do with the distribution rather than the production of wealth. The discussion would be incomplete, therefore, if we did not ascertain whether municipal or private operation adds more to the sum total of wealth.

Much has already been written which throws light upon this question. Labor is slightly more expensive per unit of product under municipal operation. I cannot find that there is great difference on this score, but wages are higher, hours of labor less, and as a rule public employees do not seem to work as effectively as private employees. Thus municipalization must be debited to a small amount of economic waste. One must take care not to overestimate its importance, for so far as increased cost is due to shorter hours and higher wages, the resulting loss is offset by an increase in social welfare, which is perhaps worth all it costs. This is therefore not a real loss to society although an economic loss, but merely a conversion of wealth into welfare. The only real loss is due to greater shiftlessness, lack of close application to work and waste of materials.

All grades of employees are not equally guilty. The higher officials and town councilors, in spite of the fact that pecuniary remuneration is not so large under municipal operation, are almost invariably as efficient as the managers and directors of private companies. If success is achieved, popular approval is so marked and social standing is so high as to counterbalance the loss in salary. Tenure is permanent, and town councilors are re-elected term after term, which make possible the formation of a consistent policy covering a long period. There is, however, a tendency upon the part of the managers and the town councils to make as good a financial showing as possible, and consequently old machinery is sometimes not displaced as soon as by private companies.

Statistical data upon these points are very hard to get. Comparing the amount of gas made with the number of tons of coal used, one finds that in 1898–9 the public plants produced 10,534 cubic feet of gas for every ton of coal carbonized (2240 lbs.), the private plants 10,894 cubic feet. But these figures are worth little, for many plants use enrichers, and unless the amounts are rela-

tively equal, the results would not be comparable. Whether such is the case, it is impossible to say. Taking the gas wasted as a test, the returns for 1898–9 show that in public plants 8.07 per cent of the total amount made is unaccounted for; in the private plants 7.64 per cent, which would indicate a very slight advantage for private operation. Cost of production sends the pendulum to the other side. Dividing expenditures by the amount of gas made, one learns that a thousand cubic feet of gas costs upon an average 25d. under municipal operation and 28.5d. under private operation —a difference of 3.5d. This is not due to a lower rate of interest, for interest is not included in expenditures in either instances, except in the case of bonds or debenture stock issued by private companies. But as the total amount of loan capital is only £9,360,000, the interest annually paid would not be more than £468,000 at 5 per cent—an unusually high rate—or 1.3d. per 1,000 cubic feet of gas. There yet remains at least 2.2d. per 1,000—a very good showing for the municipal plants.[1]

If productivity *is* less under municipal operation, a fact not substantiated by the statistics at command, the difference is very small indeed and certainly more than counterbalanced by the greater social welfare that attends a fairer distribution of wealth, and the social benefits of a cheap supply of artificial light.

PROGRESS UNDER MUNICIPAL OPERATION.

What is even more important than a comparison of cross sections at any one moment is a study from the view point of rapidity of growth: Which system is more favorable to progress? Under which method of control does the industry move forward more rapidly? This is the nub of the whole matter, the most important element, for if municipal operation retards progress, its present advantages may soon be wiped out. Return must then be had to private operation or the gas industry will stagnate, bringing in its trail all the evil effects attendant upon an expensive and inadequate lighting supply.

[1] Since this was written Mr. A. E. Forstall, secretary of the American Gas Light Association, has suggested that municipal plants may pay less for their coal than private plants, and that as gas would therefore cost less, the towns could sell it for less and still make a larger profit than could private companies. There are no statistics at hand whereby one can test this statement, but it is my impression that the difference in cost of coal is very slight and that it does not fully account for the excellent financial condition of municipal plants.

First, as to relative decrease in price. Dividing receipts by total amount of gas sold in 1887–8 (the earliest year for which the facts are given), we get the quotients 3.28s. and 3.71s. for public and private plants respectively. Comparing these with the figures for 1898–9 (3.04s. and 3.46s. respectively),[1] we find that prices have decreased some 7.3 per cent and 6.7 per cent—very slight apparent advantage for municipal operation. If it were possible to get the figures for the fifties or the sixties, prices under private operation would probably show a greater decline than under municipal management, because in the earlier years prices were very high. This marked decline came after the wide introduction of municipal ownership in the sixties and seventies and was due very largely to the frequent comparisons made between public and private plants and the evidently cheaper supply from the former. Private plants had been non-competitive in a sense, for even in the sixties there was seldom more than one company in a town; and the aim of all being the largest possible dividends, there was no rivalry as to reduction of prices between companies. When a municipal plant began operation in a town close by another having a privately owned plant, comparison was at once made. If the municipal plant offered gas at a lower rate, the citizens in the neighboring towns were apt to agitate for the municipalization of their supply. To smother this agitation prices were often reduced before they would have been if no municipal plant had been close at hand for comparison. Beginning at a higher level, the companies could of course decrease prices by a large percentage and yet remain, as at present, somewhat above the level of municipal plants. This reduction should possibly be included as one of the advantages of municipal operation.

The data as regards waste show a different result. In the three years from 1882 to 1884 inclusive (the first years for which returns are given), the average annual percentage of gas unaccounted for was 8.94 for public and 8.29 for private works. In the three years from 1896 to 1898 the average annual loss was 8.33 and 7.64 per cent respectively—a decrease in 14 years of 6.8 and 7.8 per cent. Evidently, the local authorities are not quite so progressive in this direction as the companies. Although the difference is not great, there is here a tendency which must be guarded against.

Comparing the number of tons of coal carbonized with the

[1] See page 556 *supra*.

amount of gas made for the same three-year periods, one finds that in 1882–4 the municipal plants yielded 9,908 cubic feet of gas to every ton of coal; in 1896–8, 10,397 cubic feet—an increase of 4.9 per cent. The private works extracted 10,098 cubic feet in 1882–4 and 10,624 in 1896–8—an increase of 5.2 per cent. These figures are practically worthless, for they take no account of the large quantities of enriching material used and of water gas which has lately grown in popularity with managers.

A far more accurate standard is cost of production, obtained by dividing expenditures by amount of gas made. In the three years, 1887–9 the average cost under municipal management was 25.4d. per 1,000 cubic feet; from 1896–8, 25.2d.—a *decrease* of nearly .8 per cent. For the same periods, the average cost under private ownership was 27.9d. and 28.5d. respectively—an *increase* of over 2 per cent. This evidence is negative rather than positive in character. While the margin is too small to permit of much generalization, it does tend to show that municipal ownership is not less progressive than private management.

All in all, municipal operation seems to be as progressive as private management, at least there is no marked difference in either direction as far as methods of manufacture and management of works are concerned. When it comes to a consideration of public welfare, to extensions of service and increased facilities for the use of gas, municipalities set the pace; they lead rather than follow.

RÉSUMÉ.

Summarizing the results of municipal ownership as compared with private operation under public control, it is to be said that under the former system, prices for gas, meters and fittings are lower, that the quality of gas is better, that it is much more extensively used, that wages are higher, that the treatment of laborers is better, that profits are nearly as large, that works are not as highly capitalized, that sinking funds are adequate, that productivity per unit of raw material is almost as great and that the management is fully as progressive. All in all, then municipal operation has been more successful than private operation.

It is exceedingly fortunate that municipal and private operation has been carried on side by side, as each stimulates the other and as comparisons are certain to be made, always to the ultimate benefit of the less progressive plant. The private plants

doubtless give better service and lower prices than they would if no public plants existed. On the other hand, municipal authorities are spurred on by the competition of private companies for ublic favor.

IS SUCCESS PERMANENT?

To the American student it is important to know the causes of this success, how it has been attained. There is no secret power in municipalization. It is not the fountain of youth for decrepit city governments in which they need but to bathe and then come forth every whit whole. Successful municipal operation (and efficient government in every respect) can be achieved only by securing efficient men as managers. This the British towns are able to do. They pay good salaries. The social standing of all officials is very high—a great inducement to many men who do not value an income of $50,000 much above one of $15,000 if only a higher social standing goes with the latter. The spoils system does not permeate every department destroying efficiency, integrity and self-respect. An *esprit de corps* obtains which inspires one to faithful service and severely condemns the listless and the slothful.

Not only has politics—so-called—been kept out of the municipal service, but the employees have kept out of politics. Labor organizations have seldom attempted to dictate to town councils or to gas managers, either as to wages or the introduction of new machinery. The authorities have been very generous to the employees, and the employees have refused to put in jeopardy their own welfare as well as the success of municipal operation by demanding greatly advanced wages or by opposing the adoption of improved processes. They have recognized the great gain to society from the immediate adoption of new inventions, and have not hindered progress by untimely opposition. While the labor organizations and their leaders should be given considerable credit for adopting so wise a course, public opinion would hardly tolerate such interference if it were proposed.

Another element is the good-natured rivalry between municipalities. It is the competitive idea in a new form. Comparisons are constantly made between municipal plants. If prices are higher than elsewhere or service inferior, the public comes to know it. The council and its officers are called to account at the next election. Where the social odium which attaches to mismanage-

ment is so great and the popular esteem attendant upon efficient management is so marked as in Great Britain, public opinion is very powerful, taking the place to a considerable degree of prospective dividends and profits as an energizing force to make men do their best.

There is a class of men also who seem to get a great amount of satisfaction from work well done simply because they know that it is well done. Its membership is not large to be sure, but where there is public recognition of efficient service, many able men find in the two forms of compensation as great a stimulus as produced by the large salaries or profits which are their reward under private management. Indeed, one reason why so many men of ability go into business instead of governmental service in the United States is not because great wealth satisfies their wants but because the social position and popular esteem accorded to men of great wealth is so much higher and greater than accorded to politicians. It is not the only cause, but it is an important element. In Great Britain, the position is reversed, and hence public service has the greater relative attraction.

Whether municipal gas works are likely to continue to be so efficiently and economically administered, depends largely upon the permanence of these elements. If they are preserved and strengthened, if the attruistic tendency continues to grow stronger, there is no reason why municipal operation may not grow in efficiency. But if public service becomes degrading, municipalization must deteriorate and become a bye-word. The prospect of larger profits will predominate carrying private management to the fore.

MUNICIPAL GAS AND ELECTRICITY IN A TYPICAL GERMAN CITY—HALLE A/S.

By Edmund J. James.

Owing to the great difference in the economic, social and local conditions prevailing among the various German cities, it is not altogether safe to select any one municipality and represent it as in all respects typical of other communities in Germany. The form of government, the tastes and ideas of the people, differ so greatly in the different portions of the German Empire, that what may be true of one portion or of one state is not necessarily or even probably true of another portion or another state. What is true of small cities may not of course be equally true of large cities and vice versa. What is true of cities in the south of Germany may not be true of cities in the north of Germany and vice versa. It is therefore impossible to take any one community and say it may be considered in all respects as a sample and that what is true of its relation toward such matters as the supply of water, gas and electricity, is true, even in a general way, of other cities.

At the same time, it is true that there is a general course of development characteristic of the cities in the present German Empire as a whole. Some of them are at the beginning of this development; others are fairly started upon this course; and others have reached a period of high development; and, with the reservation noted above, it is possible perhaps to select a community which shall show in its own history, to a certain extent at any rate, the direction of development of German communities as a whole. For such a purpose it is desirable to select a medium sized city, a city which is growing rapidly, a city which is trying to adapt itself to modern conditions to the fullest extent and which represents, therefore, what may be called the progressive tendencies in German municipal life. Perhaps no better example could be chosen to serve our purpose than the city of Halle on the Saale. This is one of the most ancient cities in Germany and at the

same time one of the most modern. It is a city which has grown steadily, and at times rapidly since the latter part of the forties, from a community of perhaps 30,000 souls to one exceeding 150,000. It has become a great railroad and industrial center. It has been compelled to incur large expenses to adapt the older portions of the town, which date from the sixteenth and seventeenth centuries, to the needs and conditions of modern life, and at the same time has had to provide for the care of an ever increasing population and of a population which on the whole has made ever more imperative demands for modern improvements. It may represent in a certain way, therefore, the tendencies at work in all modern German cities. Before describing the experience of the city with the supply of gas and electricity, a glance at what I conceive to be the general tendency in modern Germany in this respect may not be out of place.

THE TREND TOWARD MUNICIPALIZATION.

Regeneration of the German city dates from the fifties of this century. It was then that, owing to the growth of cities and to the general industrial, political and social development of Germany, a new and more imperative demand for extended and better supplies of certain necessities of life revealed itself in nearly all progressive communities alike. Thus, the cities were compelled to provide, generally speaking, for a more adequate and a more satisfactory supply of water, due partly to an increase in population and partly to a higher social standard as to what adequacy and quality in this respect consisted in.

To provide this new water supply, however, it was necessary to make large expenditures—much larger than could be provided for out of the current income or current taxes of these communities. The municipal financial system had not been so fully developed that it was easy to borrow money at low rates for this purpose, and consequently very many of the German cities were compelled to entrust the provision of this necessity of life to the management and control of private companies. It was no uncommon thing, therefore, to find German cities conferring extensive privileges upon private water companies—privileges which in many instances have but just begun to expire. In nearly all cases, the cities reserved to themselves the right, under certain conditions, of taking over the water supply upon payment of certain sums to the

private companies. The experience of the cities with these private companies was on the whole so unsatisfactory that those which had taken up with this method in the forties and fifties soon made strenuous efforts to get rid of the private system and replace it by public construction, ownership and management. The cities which in the sixties and seventies took up the question for the first time decided in most cases in favor of public water works. As a consequence, to-day nearly all German cities own and manage their own water works. Private companies exist only under exceptional conditions—usually where the cities, owing to the short-sightedness of previous administrations, have bound themselves to greater sacrifices in case they desire to obtain the control of the water works than on the whole they have been able or willing to make. But it is certainly true that everywhere in Germany the principle is now generally accepted that cities should own and operate their own water works entirely.

The case is not altogether so clear, perhaps, in the matter of the supply of gas. The improvements in the processes of manufacturing gas made it a feasible thing for most communities to provide for the introduction of this luxury, which has now, one may say, become a necessity of life, in the forties and fifties. The same may be said of the early attempts to provide for a supply of gas as has been above remarked relative to water supplies. The cities were in many cases unable to provide the necessary funds for establishing public gas works. Their administrations were very conservative and unwilling to take any great risks, and as a consequence the prevailing system during the fifties and sixties in Germany was that of entrusting this business to the ownership and control of private companies. But here the same tendency has made itself manifest to an increasing extent with every passing year, until the system of public ownership and control, if not quite so uniformly in the case of gas works as in the case of water works, has still come to be accepted as the proper and common one. In the year 1896, for example, 375 cities, large and small, in Germany owned and managed their own gas works. Of these, 120 had tried the system of private works in the first instance, but had gone over subsequently, at very considerable sacrifice in the way of large payments to private companies, to the method of city works. So that one can say, generally speaking, that the principle of public ownership and management of gas works is coming to be

as generally accepted in Germany as that of the public ownership and management of water works.

The introduction of electricity is still so recent that it is difficult to determine in any positive way what is the present tendency, taking the Empire as a whole. I can only express it, therefore, as my opinion, based upon such information as I have been able to collect, that the tendency to the public ownership and management of electric plants is quite as marked, though not by any means so fully developed, as in the case of the other departments above mentioned. This is destined to be of even greater significance for certain phases of municipal administration than either water or gas. Where cities own and manage their own gas works, it is evident that they must also own and manage their own electric plants if they are to prevent a very serious and perhaps injurious competition with their system of gas works. And it is my opinion that cities will either have to sell their gas works to private companies or else establish and maintain electric plants which can be worked in harmony and co-operation with the gas works.

If cities establish, generally speaking, great electric plants, the question of the relation of the city to the street car system will assume a new phase. Most of the German cities have either constructed the roadways of these street car lines themselves or own them, having been constructed by private companies. If they now establish great electric plants which will have practically the monopoly of the furnishing of electricity for lighting and power purposes, it will be a comparatively small step from furnishing electricity to the street car companies as traction power on their lines to taking over these street car lines themselves. There are certainly very pronounced tendencies of this sort in nearly all German cities and these tendencies are destined in my opinion to become even more marked than they they are at present.

SOCIALIZATION OF PUBLIC SERVICES.

One other circumstance should perhaps be mentioned of a general nature before passing on to the discussion of the principal subject of this paper. The policy of German cities in regard to these three necessities or conveniences of life has been dominated to some extent by different principles, owing to the different purposes which were primarly in view in the construction of these works.[1]

[1] The following leading cities of Germany own and operate their own electric plants: Barmen, Breslau (373,168), Bremen, Cassel, Dantsic (125,505), Dortmund,

The water works were established primarily to provide an abundant and healthful supply of water for private individuals, more especially for domestic consumption. The importance of a liberal supply of water, however, as an element in public administration, for the purpose of sprinkling and cleaning the streets, for flushing the sewers, etc., and as an aid to industry have both grown relatively speaking with great rapidity during the last generation. As a consequence, water works would probably be kept up now for the sake of industry and for the sake of public health alone, irrespective of their relation to private convenience; but the fact that they were established in the first instance, not so much for the benefit of the public administration in general as for that of private individuals and in the interest of public health has had a very pronounced influence upon the policy shown in managing these water works and upon the tariff of charges for the use of water.

The establishment of gas works by the cities on the contrary sprang in large part from the necessity which the cities had begun to feel of a better system of public lighting. It would hardly have been possible for the gas works to have been established so early in the history of these communities, if it had not been that the city would itself, for purposes of public administration, be a large consumer of the product of these works. As a matter of fact, it has continued to the present time to be the largest single consumer, and in many cases consumes nearly as much as all the other consumers put together. The feeling that gas was a luxury, or at most a convenience, of life, led the cities to adopt a system of management which has distinguished it very clearly from that of water works. Generally speaking, the element of net profit, the idea of securing a net income for the use of the city from the management of these works, has been an important one in the control and management of all the public gas works in Germany. As a result, what may be called the social point of view, that is, the view which looks upon gas as such a great convenience of life that its general use is to be desired in the interest of an advancing civilization and an advancing ease and refinement of life, and that consequently

Dresden, Düsseldorf, Elberfeld, Hannover (209,535), Cologne (321,563), Königsberg, Krefeld, Lübeck, Mayence, Nuremberg, Chemnitz, Frankfurt (229,279).

The city of Frankfurt took over April 1, 1900, the entire system of street railways, to be operated by electricity from the city works.

financial sacrifices may be made for this purpose, is a view which has only very slowly succeeded in making way into the minds of the managers of public gas works in Germany. As a result, generally speaking, the prices have been kept high, the facilities for the use of gas have been rather meager, and comparatively little effort has been made to enlarge the consumption.

Something of the same thing was true in the establishment of electric works. Here it was possible for the city to establish a small plant for furnishing light exclusively for city purposes, such as the lighting of public buildings, etc., upon a basis which made it fairly profitable for the city, irrespective of the number of private consumers who might take part in the support of such works. And it is quite possible that cities would have contented themselves with the erection of small plants for providing in this way the light desired for public offices and public illumination, without attempting to create a market for electricity in the mass of the public, if it had not been that the ever more imperative demand for electricity for purposes of lighting and power on the part of private individuals began to create a very sharp and severely felt competition with the products of city gas works. Then the cities began to realize that something of the same course of development would surely follow in the case of electric plants as in the case of gas and water.

It was impossible for cities to erect gas works for the purpose of furnishing gas to the city administration for city purposes at a reasonable price, unless a large number of private consumers could also be obtained whose consumption would help decrease the expense. Consequently the cities, in the management of the works, were compelled to have some reference to the needs of private consumers. In the case of electric works it was necessary for the city to furnish electricity to private consumers if it was to avoid ruinous competition with its own system of gas works, and thus, generally speaking, gas and electricity, from being looked upon as articles of luxury, have become first articles of convenience and finally articles of necessity, and cities are now everywhere recognizing that there is a social advantage, an industrial advantage, to be found in a liberal and cheap supply of gas and electricity, offered on the most favorable terms to every individual in the community. As a result of the recognition of this fact, there has come into the management of all public works of this sort in Germany within

the last few years an entirely new spirit, which is destined to work out the most far reaching results. Men are beginning to see that the supply of power at low rates to the small man in the most remote cities of the Empire means an increase of the power of Germany as a whole to compete with the foreigners in the world's market upon the most favorable terms. The fact that a city offers such facilities is, of course, a very great inducement to people who need power in the working of their industries, who need it in small quantities and at low prices, to settle in these particular places rather than in others in Germany. The fact that such facilities are offered in Germany and in proportion to the extent to which they are offered, does Germany as a whole become a more important element in the world market in every department of manufacture.

So much for what may be called the general course of development on this subject in Germany. Without being able to establish the proposition within the limits of such a brief article as this, I think I may lay it down as true, without fear of successful contradiction, that the tendency in Germany is steadily and rapidly toward public construction, ownership and management of all water works, gas works, electric plants and street railways, and that on the whole the policy underlying the management of these different departments of public administration is that of lowering the prices and increasing the facilities in the interest of a larger and healthful life, in the interest of an advancing industry, and in the interest of improvement of higher social conditions. This tendency is fairly represented in the history of the city of Halle in these matters.

The matter of water works may be disposed of in a single paragraph. The city of Halle has owned and operated a system of water works ever since the sixteenth century, and although various small private enterprises were started at different times to provide water for different portions of the suburbs or outlying portions of the city, they never acquired any considerable importance, and since the year 1867 the city has undertaken to provide for an ample supply of good water for domestic, public and industrial purposes. This has been done in a very satisfactory way. The water rates have been kept low. The encouragement for a liberal use of water has been continuous. And the policy of

the city in this regard has on the whole been an eminently satisfactory one. Although the works have at times yielded a profit, the general policy of the city has been to reduce the water rates and to increase the facilities as rapidly as circumstances made it possible. The experience of the city in this respect has been very similar to that of other cities in Europe and America. No suggestion that this important branch of public administration should be handed over to a private company has ever been made so far as I have been able to ascertain, and any proposition to do so would be looked upon by the entire population as absurd in the highest degree.

I.

ESTABLISHMENT AND DEVELOPMENT OF THE GAS WORKS.

As the result of an agitation extending over several years in the early and middle part of the fifties, the city administration, after having secured the promise of a large number of citizens to take gas at a certain price and in a certain quantity from the public works, received the consent of the superior administrative authorities to construct and operate a system of city works. The land was purchased for this purpose, a public loan was contracted, and the works were erected and went into operation on the 14th of December, 1856. They have been continuously in operation from that date to the present, and although the experience of the city during the first two years was rather unfortunate, still there has never been any serious proposition to hand over this department of public administration to any private company. The works have been gradually extended; the consumption of the city has grown, not only with the population but relatively much faster than the population, the latter having increased less than three-fold, while the former increased more than nine-fold, in the thirty-five years from 1862 to 1897. Whatever charges may be made against the administration of the city gas works, it cannot be denied that after they were fairly at work they have been administered with honesty and efficiency, within the limits of the principles adopted by the city; but one may criticise at more points than one the principles laid down by the city within which the works were to be administered.

The following tables set forth the growth of the works during the forty years—1856–1897—by five year periods; and the recent growth by years:

TABLE A.—DISTRIBUTION OF GAS, 1856 1897.

Period. [1]	Population.	Production. cbm.	Public Lighting. (Streets and Squares.)		Sold to Private Consumers and Public Offices		Used in the Works.		Loss	
			cbm.	%	cbm.	%	cbm.	%	cbm.	%
1856 62	41,507	2,870,574	481,651	16 8	1,870,461	65 1	50 000	1.8	514,462	17 9
1862 67	48,940	4,530,579	614,657	13 6	3,907 994	79 1	63 864	1 4	277 819	10 7
1867 72	54,814	6,433 774	859,989	13 3	4 794,083	74 6	71,811	1 1	708 096	10 9
1872 77	65,140	10,149,500	1,088,478	10 5	7,711,494	76 0	80 007	0 8	1,269 861	12 8
1877 82	74,816	13,911,736	1,533 916	13 5	9,119,957	74 6	187 048	1 5	1,070 815	11 3
1882 87	87,373	16 856,080	2 931,100	17.5	11 808 434	71 0	163 700	0 9	1,861 980	10 6
1887 92	100,000	24,151,800	4,074 807	16 4	16,176 896	67 8	998 000	1 9	2,804,174	11 8
1892 97	122,906	26 084,920	6,014,818	24 9	17 001 009	66 9	990 009	1 1	2 048,098	7 1
	Total	108,833,110	18 705,500		79,700 911		1 908 990		11 107,000	

[1] The first period is from Dec. 14, 1856, to June 30, 1862. The fiscal year was changed in 1897 so as to close March 31.
[2] A cubic meter = 35.3 Eng. cu. ft. 35.3 c. m. = 1000 Eng. cu. ft.

TABLE B. DISTRIBUTION OF GAS.—1894 1899.

Year.	Consumption per capita. cbm.	Production. cbm.	Public Lighting. (Streets and Squares.)		Sold to Private Consumers and Public Offices		Used in the Works.		Loss	
			cbm.	%	cbm.	%	cbm.	%	cbm.	%
1894-95	42.75	5,165,880	1,369,977	26.5	3,616,781	70.0	58,496	1.8		
1895-96	43.33	5,519,040	1,348 677	24.5	3,680,801	66.8	59 904	1.0	481,608	8.7
1896-97	46.15	5,891,190	1,390,996	23 6	4,096,985	69 4	59,748	1.0	419,511	7 0
1897-98	46.95	6,293.950	1,376,960	22 1	4,408,648	70.8	74,787	1.2	384,010	6.2
1898-99	57.87	6,956,740	1,317,561	17.5	5,141,800	74 0	88,799	1 2	501,087	7 8

TABLE C.—FINANCIAL ACCOUNTS.[1]—1856-1897.

3-31-1897, $482,058 Book Value of Plant.

Period.	Sinking Fund.	Profits Paid into City Treasury.	Cost of Works and Extensions.	Depreciation Fund.
1856-62	$20,633	.....	$183,190	$15,896
1862-67	56,543	.....	21,596	16 101
1867-72	19,271	$64,708	6,994	15,766
1872-77	22,579	94,788	70.584	19,085
1877-82	62,006	158,940	152 471	29,061
1882-87	70.275	174,642	55,255	84,278
1887-92	48.631	299 587	285,879	67.069
1892-99	22,606	356,047	92.769	106,804
Total	317 544	1,148,657	868,788	303.561

[1] In changing to American money, 4 marks=$1.

TABLE D.—FINANCIAL ACCOUNTS.[1]—1894-1899.

Year.	Sinking Fund.	Profits Paid into City Treasury.	Cost of Works and Extensions.	Depreciation Fund.
1894-95	$4,480	$68,155	$805,289	$17,125
1895-96	4,480	71,881	824,709	19,230
1896-97	4,480	75,516	.....	27,540
1897-98	4,480	79,591	978.534	34.187
1898-99	7.808	71,918	'1,012,945	37 023

The following table shows the use of gas for cooking, heating and for power purposes during the six years ending March 31, 1899:

TABLE E.

Year.	Cooking and Heating. cbm.	Power. cbm.	Total. cbm.	Per cent of Total Amount of Gas Produced.
1893-1894	53,148	366,543	.....	....
1894-1895	109,417	420,406	529,823	10.2
1895-1896	117,920	499,506	617,506	11.2
1896-1897	180,798	566,321	756,119	12.8
1897-1898	230,466	644,171	874.637	14.0
1898-1899	321,018	845,045	1,166,063	16.8

It will be seen that the consumption per head of the population increased during the last quinquennium from 42.75 to 51.37 cbms., showing a steady relative increase during this period.

The present capacity of the works is about 47,500 cb. m. per day.

TARIFF OF CHARGES.

The following represents the course of prices charged for gas in the city works of Halle, from the establishment of the works to the present time :

I. Charge to private consumers per thousand English cubic feet for illuminating gas.

1856	$1.67
1859	1.88
1864	1.44
1870	1.35
1872	1.21
1898	1.08

II. Price to private consumers per thousand English cubic feet for heating, cooking and power purposes.

Up to 1887	Same as for lighting.
From 1887 to 1894	$0.91
Since 1894	0.6739

The above represents what may be called the normal or fundamental prices to private individuals. A discount has always been allowed, increasing in proportion to the amount consumed, varying from 2½ per cent for 10,000 cbms. or more up to 25 per cent for 50,000 cbms. and more. No discount, however, was given after 1887 upon gas used for heating, cooking and power purposes, being straight $.91 from 1887 to 1894 and straight $.6739 since that time. In the year 1898-9 eleven consumers obtained the 25 per cent rebate. Among these was the city for all gas consumed in public offices. Nine obtained 20 per cent; five, 15 per cent; twenty, 10 per cent; fifty-one, 5 per cent; two hundred and seventy-six, 2½ per cent. Out of a total of 3,651,581.49 cbms. sold for illuminating purposes, 2,678,915 cbms. were sold at discounts varying from 2½ per cent to twenty-five per cent.

Down to the year 1887 the city was obliged to pay for all gas consumed at the same rate as private persons, though its consumption was always sufficient to enable it to obtain the 25 per cent discount. From 1887 to 1898 it obtained gas for the purpose of street lighting at the rate of $.91 per thousand cubic feet, subject to no discount. This, it will be seen, was no real reduction, since $1.21 less 25 per cent = $.91. Since 1898 it obtains gas for the purpose of street lighting at $.6739 per thousand cubic feet, subject to no discount. That is to say, for gas consumed in public offices, the city has always paid and still continues to pay at exactly the same rate as private individuals, obtaining the largest allowable discount because its consumption always exceeds the largest amount for which the discount is granted. For purposes of

street lighting it had the same terms down to 1887. After that it was given the same rate for street lighting as private parties received for heating, cooking and power purposes. The reduction which was made to private parties for heating, cooking and power purposes, in 1894, was not granted to the city for street lighting purposes until the year 1898.

Until the close of the fiscal year 1897-8, that is, the 31st of March, 1898, the city gas works made a charge for the use of meters, which constituted for the small consumer a very serious addition to the price of gas. It also charged the private consumer with the cost of connections from a point six feet outside of the building line to the meter in the house. This constituted a very serious obstacle to the general introduction of gas into the houses. Beginning with the first of April, 1898, three important concessions were made in the matter of price and convenience to the gas consumer. The price of gas for illuminating purposes was reduced as will be seen from the above table from $1.21 to $1.08 per thousand cubic feet. The city gas works undertook to make connections at its own cost up to and including the meter, making no charge for the use of the latter, provided a certain minimum amount of gas was consumed. So that one may say now what one could not say prior to the first of April, 1898, that the cost of gas to the private consumer in his own dwelling for illuminating purposes or for heating, cooking or power purposes is the same as that quoted nominally in the tariff of charges, namely, $1.08 and $.6739 respectively.

METHODS OF BOOK-KEEPING.

It is difficult to ascertain from the printed reports of any corporation the exact condition of its business. It is still more difficult, generally speaking, in the case of municipal corporations. And it is most difficult of all in case of those branches of municipal administration which one may desire to compare with private corporations as to cost of the plant, running expenses, profits, etc. The books of the gas works of Halle show the entire expense of the works from the beginning to the present. They show that the works have been compelled to purchase the ground upon which they are erected, either from the city or from private parties, and that, therefore, the cost of the site is included in the cost of the plant. They show, moreover, that gas has not been furnished to the city at any time free of charge but that it has had to pay for

every cubic metre of gas consumed, though it has generally been placed in the position of the most favored consumer, owing to its large consumption. Thus, at present the city pays the same rate as noted above for purposes of street lighting as the private consumer pays for cooking, heating and power purposes. It pays the same for lighting in the offices as the private consumer pays for gas for illuminating purposes. From 1894 to 1898 the private consumer was somewhat better placed in the matter of rates for gas used for cooking, heating and power purposes than the city for street lighting. Just how much of a concession this has been to the city it is of course difficult to tell and the books do not show any special reckoning or account of this item.

No set off is noted in the books for taxes, corresponding to the taxes which a private corporation would be obliged to pay, under the ordinary rules prescribed for such companies. The works have always had to pay a state tax, under the head of the trade tax, amounting of late years to something like $1,500 a year. And although the proceeds of this tax are now handed over by the state to the city for municipal uses, this item of $1,500 a year for taxes still appears in the books. No item appears on the books corresponding to the special sum which a private gas company might be obliged to pay for the concession or the monopoly right to furnish gas to the community. The books show that a sinking fund has always been created whenever a debt has been created, amounting to at least one per cent a year. They also show that a renewal fund has been accumulated from time to time in anticipation of the necessity of reconstructing the works in order to bring them into harmony with improved and advanced conditions. The books also show that very considerable sums have been charged to the depreciation fund—sums sufficient to keep the works in good condition and, as experience has shown, to provide for extensions from year to year. Aside from the sinking fund, the renewal fund and the depreciation fund, considerable sums have been entered every year under the head of maintenance, which might have been charged to the capital account.

No one can examine these books without being convinced that the gas works on the whole show a very conservative and very sound system of book-keeping. Thus, if one deducts from the total cost of the works the sums charged off for depreciation, one obtains a book value of 2,220,241.08 marks ($555,060) at the end of

the year 1898-99. This represents a very conservative estimate of the present value of the works. It is the opinion of the director of the works and others with whom I spoke in the city that the works could be sold to-day as they stand for a considerably larger sum than this to a private company, not including, of course, the price which the company would be willing to pay for the franchise or for the monopoly right of furnishing the gas to the community. In other words, the system of book-keeping has been such as to make all proper allowances for depreciation of the works, and the sums written off each year have not only been sufficient to pay interest on the bonded debt, but also to accumulate a sinking fund equal to retiring the bonds when they fall due; not only a sum sufficient to keep the works in the present condition, but also a sum sufficient to reconstruct the works whenever the advance of science and technology should make this necessary or desirable, and furthermore to extend every year by a considerable amount the system of pipes, etc., connections with the houses, meters, plant, etc., etc.

The net income of the works based upon the estimate of the state tax commission assessing them to the trade tax was for the past year 338,113.74 marks ($34,528). The capitalized value of the plant according to the same estimate was 2,741,815.45 marks ($685,454). This would show that the works paid a dividend of 12.3 per cent on the capital value of the plant or a dividend of 3 per cent on more than ten millions of marks, while the actual book value as shown above is less than two and a half million marks. Of course in this larger value would be included the value of the franchise; but even so, this shows a very conservative estimate of the value of the works in the accounts of the works themselves.

The accounts of the works for the year ending March 31, 1899, show that the total income was 1,416,111 marks ($354,028). Of this, 287,652 marks ($71,913) were turned into the city treasury, representing 20 per cent of the total income; 90,192.20 marks ($22,548) were set aside for extensions of the plant, representing 6 per cent of the total income; 30,000 marks ($7,500) were set aside for the renewal fund, representing 2 per cent of the total income; 31,231 marks ($7,808) were set aside for the sinking fund, representing 2 per cent of the total income; 36,138 marks ($9,034) were used for the purchase of new instruments, apparatus, gas meters, etc., representing therefore an actual increase of the pltna

to that amount, equal to 2 per cent of the total income. A balance was left on hand of 27,823 marks ($6,956) which, together with the sums already indicated, made up a total of 503,036 marks ($125,759), leaving a sum of 913,075 marks ($228,269) to represent the current expenses of the works. In this sum, however, again very considerable items were included for cost of maintenance, which conception covered also in certain instances actual additions to the plant. If we count the renewals, extensions and the purchase of new equipment, it will be found that about 7 per cent of the book value of the works at the end of the preceding year had been added to the plant during the current year—1898-9. The accounts show that the works have written off during the past years an average of 3 per cent a year under the head of deterioration to the account of lands, 3 per cent for buildings, 10 per cent for apparatus (retorts, furnaces, etc.), 7½ per cent for the pipe system, 20 per cent for implements, 20 per cent for meters, etc., etc. Thirty per cent was written off during the past year for house connections, since under the arrangement now in existence, connections made by the gas works within the property of the house owner passes into the possession of the house owner himself. From whatever point of view, therefore, the accounts are examined, it would seem as if the gas works are pursuing a very conservative and safe policy, maintaining the works in their present condition, extending them and improving them.

RESULTS OF MUNICIPAL OPERATION.

If we sum up the results achieved by the gas works of the city during the period from 1857 to 1899, we should note especially the following points. In the first place, the city now has in its possession and entirely at its disposal, to do with as it chooses, a plant for the manufacture of gas, with a capacity of 17,327,500 cbm. per year, with a capitalized value, after deducting all debts and obligations of every sort, of 2,241,873 marks ($560,468) capable of paying dividends on a capital of from ten to twelve millions.

In the second place, a plant from which the city has derived a very large sum in net profits, amounting all told to more than five millions of marks ($1,250,000).

In the third place the city has enjoyed during all these years the advantage of a liberal gas supply for public purposes, street illumination and public offices, at a price considerably below

the average price charged for gas by private companies or cities in Germany at large.

In the fourth place, the private citizens have had the advantage of comparatively low prices for gas during the entire existence of the works, for if the tariff of charges made in Halle be compared with that in other cities, whether made by city works or private works, it will be found that prices in Halle are on the whole slightly below those of cities similarly situated.

The city has, moreover, the very great advantage of being in a position to regulate the policy of the gas works in accordance with its notions of the best interests of the city and the citizens, without having to pay a private company large sums of money for this privilege. How important this is, may be seen from the recent events in the history of the city mentioned already in the above paragraphs. It was felt that the prices of gas should be lowered to the private consumer and to the city. It would have been difficult to have brought this about under a system of a private management. A mere resolution of the city council was sufficient to accomplish this, beginning with the first of April, 1898, and, as noted above, this was not simply a reduction in the price charged for gas, but it involved a very large additional reduction to the small consumer, because at the same time the charge for meter rent was practically abolished and the cost of making connections was assumed by the gas works.

It is an interesting fact which may be mentioned in this connection that the introduction of the so-called glow burner, the Auer or Wellsbach burner, has had a very material influence upon the course of prices and the course of consumption. The general introduction of this burner enabled the private consumer to obtain a very much better quality of light at a much lower price, owing to the smaller consumption of gas, than had been hitherto possible. This led on the one hand of course to a certain reduction in the amount of gas consumed for lighting purposes per light, but on the other hand, owing to the very greatly increased attractiveness of this light, it led many people to prefer the introduction of gas to the continued consumption of coal oil. An increased price of the coal oil itself was not without effect in stimulating this gas consumption. And, as said above, the competition which private electric plants were making with the city works was so seriously felt as to lead the city to make concessions in this matter which it might not formerly have done.

[redacted]

they have grown old in the service they will not be allowed to starve, even if they become incapacitated for work. The city gas works are subject to the general imperial laws relating to compulsory insurance which are applicable to all employers of labor.

II.

THE CITY ELECTRIC PLANT.

Since the introduction of electricity in 1887, '88, '89, '90 and '91, and the rapidly growing utilization of the same for purposes of lighting and for power, German cities have had to face the question whether they would grant to private companies the right to lay their wires in the city streets and furnish electricity to private consumers, or whether they would undertake the manufacture and sale of electricity themselves. They have shown a certain reluctance to embark upon the business of furnishing electricity to private parties. As a result, in many directions electricity has not been introduced as rapidly as it would have been introduced if the cities had been willing to grant permission to private companies to undertake this work. Halle is perhaps a good example of this fact. Up to the present, electricity has not found that wide, extended application for purposes of lighting and power in the city of Halle which one might have expected from the rapidly growing industrial character of the city. The city has refused to grant permission to private companies to lay their wires in the streets, and as a result electric lighting is very largely limited to individual plants or blocks of land which can be reached from all parts without making use of public highways.[1]

The general introduction of the Auer burner spoken of above has tended to reconcile the people to the lack of electricity for lighting purposes, but the pressure on the part of private individuals and of public companies for a supply of electricity finally became so great that the city was compelled to take up a definite and distinct attitude toward this problem. The feeling at first was overwhelmingly in favor of granting a concession to a private company and making such terms for the grant of the franchise as the city might be able to do. Various commissions were appointed,

[1] So far has this unwillingness to favor electricity gone that the city works have uniformly refused to give the lowest rate of 10 pfgs. per cbm. to consumers who used the gas to drive engines for the manufacture of electricity for lighting purposes, *i. e.*, they refused to favor their competitors in the business of furnishing light; even though they were entitled to this favor under the general rule.

It is worthy of note that the city works have lately adopted for the first time in their history a new point of view, namely, that it lies in the interest of the community as a whole to increase the consumption of gas, to supplant the use of coal with all the inconvenience and dirt connected with it by the use of gas; and for the first time in the history of the works during the past four or five years, efforts have been made to extend the use of gas, not only by the reduction of price and the abolition of obstacles to the introduction of gas, but by a positive recommendation of the use of gas to the public, such as the holding of exhibits of gas stoves, heaters, etc., and public lectures upon the method of utilizing gas for cooking, heating and power purposes.[1]

It is furthermore a point not to be underestimated that the city, having control of these works, may furnish gas for power purposes at a rate at which no private company would undertake to offer it. This policy is justifiable because the existence of a cheap, easily divided power facilitates the development of many forms of industry which might not otherwise be so easily possible.

Whether private works would have accomplished the above results, or, if not the above, other and more favorable results, cannot of course be determined in any positive way by an examination of the history and working of this municipal enterprise. But it is certain that the city of Halle, and indeed I think I may say that no individual in the city of Halle who is not connected with some private gas company would consider for an instant the advantages which a private company might offer when laid in the balance against those which the city works secure. There seems to be an opinion in Halle, both at the works and at large in the city, that no special concessions have been made to the laborers at the works. The administration has aimed to pay the usual local rate of wages—neither more nor less. The greater permanence of employment makes the work on the whole so attractive that they can have their pick among the laborers in the community. The effort is made to keep the same laborers as long as possible and if

[1] It should be stated that thus far but little use of gas has been made in Halle for the purpose of illumination in private houses. Nearly the entire consumption up to within a year or two has been for public lighting (either streets or offices) and in the shops, factories, stores, banks, etc. The city works have, therefore, before them an almost unexploited field of possible consumption which is likely to prove more profitable every year; though this very fact, it must be admitted, is a just cause of reproach to the administration, in that it has not worked this field long before.

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Some of these made very careful technical examinations with the aid of technical experts. Some of them visited the works built in other cities. And the final outcome of the whole movement, after a very excited and in some respects bitter discussion, was an overwhelming vote in the city council in favor of public construction, ownership and management of an electric plant. It is an interesting fact that all experts consulted by the city council or its committees, who were not personally connected with some private electric company, advised the city by all means to install its own electric plant, to construct, own and operate on its own account, without recourse to the medium of a private company.

The arguments advanced by Professor Karl Schmidt of the University of Halle, in favor of city management, were convincing and, when supported by the opinion of Dr. Klingenberg of Berlin, commanded the assent of the city authorities. It appears from their report that they sent a schedule of questions to thirty-one cities, which in their size or their industrial importance might be compared with Halle. Of twenty-nine cities, from which they obtained reports, twenty-two owned their own electric plants, and from the first of April, 1899, nineteen of them will manage their own works directly, only ten out of the twenty-nine having entrusted the management to private hands. Cassel, Elberfeld and Cologne are building new and extensive plants at their own cost and will undertake the management of the new works. It is important to notice that these cities, at a time when it is necessary to construct entirely new plants, have decided that they would construct and manage them themselves, after having had an experience of from nine to twelve years with the older type of works. The statement is made by the committee which visited these various plants that they found the public sentiment nearly universal that a city like Halle, in which industry has taken on such an enormous expansion of late years, ought not to hesitate a moment to construct and manage its own electric plant. It was the opinion of the experts without exception that the construction and management of an electric plant is much simpler than the construction and management of gas works and that where a city has successfully performed the latter, it may without doubt do the former.

It will be of interest to note the points which Professor Klingenberg made in favor of public works, for it was his argument which finally decided the question in favor of a city plant.

He called attention in his expert report to the fact that experience had shown ever more clearly that those cities which did not own and manage their own gas works and their own water works were at a great disadvantage as compared with those cities which did; and in his opinion the same thing was true now and would be still truer in the future, of electric plants.

It is possible that a city may make an agreement with a private company which for the immediate present would be satisfactory and fair to both parties, but in a department of industry where changes are so rapid, experience has shown that it is extremely difficult for a city to change its contract with a private company in such a way as to be of advantage to it. It must nearly always pay a very high sum for the privilege of doing so. As the private companies are thus successful in opposing any change from which they do not derive the very highest advantage, the city is practically compelled to hand over to the private company a much larger proportion of the returns than would otherwise be necessary. He called attention further to the fact that the city which owns gas works can hardly permit a private electric company to come in and compete with it, as the situation would become practically untenable for one or the other. He emphasizes, moreover, the fact of the great advantage which a city may obtain from having the power of altering the rates in accordance with its general industrial and social interests, without consulting the special interests of a private company. He is, moreover, of the opinion that judging from experience it is impossible to make an agreement with a private company, by which the works can be kept in a proper condition and handed over to the city at the expiration of a lease under conditions which will be reasonably favorable.

As a result of these various reports, a commission worked out an estimate of the cost of the enterprise, which was laid before the city council on the 7th of November, 1899. The proposition called for an appropriation of 2,600,000 marks ($650,000). It was approved by the city authorities and a public loan was negotiated, at the rate of 3½ per cent, from the city savings bank.

The city has thus begun the experiment of a city electric plant to furnish light and power for illumination, cooking, heating and driving machinery. The experiment is likely to have far reaching results. Already the city authorities are working out a plan of assuming the entire system of street railways in the city, which was

built by private companies and is run by electricity. The city may purchase these roads under the terms indicated in the contracts between the private companies and the city and it is believed that a favorable opportunity is now offered of managing them at a reasonable rate. There is little doubt that before long the entire system of railways, considerably enlarged and extended, will be in the hands of the city.

What the practical outcome of this state of things will be is of course something for the future to decide. But, judging from the experience of the city administration up to the present time, there is every reason to anticipate a successful result, even though it may not in all respects correspond to what the advocate of private ownership would claim for the private system. It is interesting to note by the way that Halle was the first city in Germany to introduce a system of electric traction in its street car system upon a large scale. It is extremely well provided with street car facilities, as such cities go in Germany. The rates are low and the service satisfactory. The city receives a certain proportion of the net profits of the companies. Whether it would make a better bargain with private companies to continue the present system or would obtain greater profits by undertaking the management itself is something of course which at present writing nobody can determine; but public opinion is drifting rapidly and surely to the side of public ownership and management.

PUBLIC GAS WORKS IN ITALY.

By Riccardo Bachi.

During recent years the municipalization of public services has gained considerable popularity in Italian cities. The old-time notion that the city was the worst possible administrator and as such should confine itself to a minimum of functions, is now giving place to a new tendency which seeks to entrust to the municipality more extended social functions and wider activities in economic life.

Thus, under the pressure of public opinion, numerous cities have recently assumed the management of the gas supply. Padua, Como, Spezia, Vicenza, Voghera, Asti, Vercelli, Udine and Reggio-Calabria have established municipal service, while other cities hold this matter under advisement, notwithstanding the hostile attitude of national legislation. All of these cities are of medium size and importance. The larger cities, such as Naples, Rome, Milan, Turin and Venice, which by taking over these services would open a plentiful source of income, are bound by long-term franchises with private corporations.

PADUA.

In Padua, a city with over 90,000 inhabitants, near Venice, the supply of gas was in the hands of a private company (*Società Civile Lionese*) since 1845. The first franchise was renewed May 27, 1867, for 29 years, expiring September 30, 1897. The price of gas was fixed in 1867 at 16.46 centesimi per cubic meter (93.2 cents per 1000 cubic feet) for public lighting, at 17.28 centesimi (97.9 cents per 1000) for the city hall and extraordinary occasions, at 36 centesimi ($2.04 per 1000) for other public institutions, and at 38 centesimi ($2.15 per 1000) for private consumers.

In 1887 the company sought to obtain an extension of the franchise until 1917, proposing to lower the price for industrial and household purposes to 28 centesimi ($1.59 per 1000) per cubic meter. The offer was renewed in 1890, but the far-seeing municipal of-

ficials steadily refused to entertain the proposition, having in mind municipal operation.

The franchise granted in 1867 provided for the purchase of the works and pipes by the city on the basis of an "industrial valuation." Negotiations were began in 1895 under the direction of the gas manager of Triest, whose services had been secured by the city. After various propositions and counter propositions had been made, an agreement was reached by which the city was to begin operation before the expiration of the franchise, *i. e.*, August 1, 1896, and pay the company 380,000 lire ($76,000) for its plant and pipes and 270,000 lire ($54,000) as compensation for the profits which the company might realize during the remainder of the franchise period (14 months).

In order to improve the facilities, the municipality soon resolved to extend its plant and pipe-lines at an expense of 170,000 lire ($34,000), besides setting aside 100,000 lire ($20,000) as operating capital. Furthermore, in order to insure accurate and independent financial administration, the Popular Co-operative Bank (*Banca Co-operativa Popolare*) was made the depository of this new municipal department, keeping an account of all receipts and expenditures.

The management and control of the plant was vested by the ordinance of June, 1896, in a commission composed of seven members and elected by the municipal council, four of whom were to be replaced at the end of three years, and the others three years later. Three members could be private citizens—outside the city council. This commission presented to the municipal council through the municipal board (*giunta municipale*)[1] during October the estimates for the coming year including cost of necessary improvements, and in March its annual report for the past year. The price of gas was fixed by the municipal council with the advice of

[1] According to the municipal laws of Italy, the enrolled voters of each commune elect municipal councillors (*consiglieri municipali*) who constitute the municipal council (*consiglio comunale*)—a body having legislative functions. The executive functions rest with the municipal board (*giunta municipale*) composed of a number of municipal councillors, varying according to the population, but always selected by the municipal council itself. The presiding officer of the *giunta* is the mayor (*sindaco*). The *giunta* is analogous to a cabinet of ministers, the syndic exercising supreme control over the entire municipal administration, while the single members of the *giunta*, called assessors, have charge of some particular branch of service, such as lighting, public works, schools, etc. The *giunta* presents each fall to the municipal council the estimates for the coming year, which are discussed and voted by the council.

the commission. The purely executive part of the management was entrusted to a director, subject to the authority and supervision of the commission.

This ordinance remained in force only a few years. A commission composed of private citizens and members of the city council proved not to be the best method of management. Not all of the members showed the necessary technical knowledge and the minute care essential for the successful management of such an important industry. In February, 1899, a new ordinance was passed which nominally places the mayor (*sindaco*) at the head of the department, but the responsible manager is a director who is paid a considerable salary and who is given large powers. The price of gas is fixed by the municipal council at the suggestion of the municipal board. The latter also determines the price of the various by-products, meter rents, and the prices for which gas appliances are sold or rented. The *giunta* also fixes the number, duties and salaries of the higher officials and has the sole right of appointing them. The director has complete control over all other employees, and with the mayor hires them and fixes their salaries. This system has given satisfactory results.

On October 1, 1897, the price to private consumers was lowered to 20 centesimi ($1.13 per 1000) for lighting and heating (including the government tax of 2 centesimi) and to 18 centesimi ($1.02 per 1000) per cubic meter for industrial purposes. The result was a considerable growth of consumption.

	Cubic meters.
From August 1, 1895, to July 31, 1896 (private management, price 38 centesimi), the consumption by private persons was	902,955
From August 1, 1896, to July 31, 1897 (municipal management, price 38 centesimi), the consumption by private persons amounted to	965,696
An increase in one year of about 7 per cent	62,741
With the reduction of price, consumption rapidly increased. During the last quarter of 1896 (municipal administration at 38 centesimi), the consumption was	322,239
Last quarter of 1897 (municipal administration at 20 and 18 centesimi respectively)	431,951
An increase of about 34 per cent	109,712

This increase of consumption steadily continues. Private persons consumed during 1896, 923,700 cubic meters; during 1897, 1,093,000; and during 1898, 1,423,000. The estimated consumption for 1900 is 1,533,000 for private lighting and 70,000 cubic meters for motor use—an increase of about 75 per cent in four years.

The financial results have been excellent. Between August 1, 1896, and September 30, 1897, the price of gas was the same as charged by the company. The estimated profits for this period of 14 months were 270,000 lire ($54,000). The profits actually realized amounted to 290,000 lire ($58,000). The *net* yearly profits of the service are now, with reduced prices, about 70,000 lire, ($14,000) and are used for the rapid amortisation of the bonds, so that within *ten* years the municipality will own free from all debt a revenue-producing plant and have a relatively large income, which under private management would have gone to private speculators. To this *net* profit, one may properly add 45,000 lire ($9,000), a saving to the city in the cost of public lighting. This expenditure, $18,000 prior to municipalization, is now less than $9,000 per year.

The laborers of the department have also benefitted by municipalization. A special fund (*Cassa di Previdenza*) has been instituted for their benefit. This fund is formed from contributions by the laborers—a three per cent deduction from their salaries—and a contribution on the part of the city of seven per cent of the salaries paid. From this fund the employees receive aid in case of sickness and accident.

Under municipal operation many important improvements for the purpose of increasing the production and distribution of gas have been made. Immediately after taking over the plant, it was greatly extended and modernized. Additional holders were constructed, new mains laid, new condensers, washers, scrubbers, furnaces, etc., purchased; and in every other way the works have been kept up to date.

SPEZIA.

The city of Spezia erected in 1865–66 a gas plant of sufficient size to meet the contemporary demand, which did not exceed 500 cubic meters per day. The total cost of real estate, plants, pipes, etc., amounted to about 150,000 lire ($30,000). The works were leased to private companies, but the results were so unsatisfactory that in 1877 the city took direct control and began operation. The

increasing demands necessitated the enlargement of the works from time to time, and the capital outlay up to date reaches 450,000 lire ($90,000). The maximum capacityof the plant has been increased ten fold, the average yearly production being 1,250,000 cubic meters. Of this amount 640,000 cubic meters are furnished to private consumers and the government bureaus for lighting, heating and power; 330,000 cbm. are used to light the city and its suburbs; 130,000 cbm. in municipal buildings, school-houses and other buildings for public use, and the remainder is lost by leakage and condensation in the pipes.

Gas is sold at 25 centesimi per cubic meter ($1.42 per 1000) for lighting, and 20 centesimi ($1.13 per 1000) for power and heating, including the government tax of 2 centesimi per cubic meter.

The approximate yearly receipts from the sale of by-products (coke, tar, etc.) amounts to 60,000 or 70,000 lire ($12,000–$14,000), exclusive of the value of coke consumed in the municipal buildings and gratuitously furnished to the schoolhouses and public buildings. The average operating expenses are about 190,000 lire $38,000) per year, and the receipts reach nearly the same sum, so that the city is able without extra cost to light all the streets and municipal buildings free of charge besides a number of schools and public buildings.

COMO.

Como is a rich industrial city of northern Lombardy, having about 37,000 inhabitants. Its gas works were constructed about the middle of the century by the *Società Italiana per il gas.* When the franchise was about to expire (in 1894), a struggle between the municipality and the company took place, which threatened to leave the city without light for some time at least, as the municipal administration would not relinquish its rights and did not wish to extend the franchises. To secure control of the works, the city was called upon to pay 400,000 lire ($80,000). The local banks were willing to advance the capital, but at an excessive rate of interest. At this juncture a wealthy citizen drew a check for the amount which he loaned to the city at the relatively low rate of 4½ per cent. Thus the municipality of Como came to own its gas works on November 1, 1894.

The management of the industry is in the hands of five persons chosen by the municipal council, three of whom must be

members. The purely executive work is performed by a director chosen by the same body.

The financial results have been from the first very excellent. During the year 1895, the private consumption was 1,248,014 cubic meters, and the public consumption 158,895, the gross profits (the sum remaining after paying cost of production) amounting to 115,954 lire ($24,000), expended as follows :

	Lire.
Rent of building (municipal property)	5,633
Municipal gas tax	13,087
Interest charges	19,550
Public lighting	27,038
Amortisation of the capital debt	20,000
Net profits	30,646
Total,	115,954

During the year 1896 the private consumption was 1,359,000 cubic meters, and the gross profits were 183,458.49 lire ($37,000), distributed as follows :

	Lire.
Depreciation account	58,085
Public lighting	46,004
Municipal gas tax	13,737
Rent	5,632
Interest charges	19,550
Net profits	40,450
Total,	183,458

For the year 1897 the figures remainded almost unchanged, while the net proceeds reached about 85,000 lire, leaving, after a deduction of 20,000 lire for amortisation purposes, some 65,000 lire—a large gain. Finally, for the year 1899, this gain is estimated to reach the satisfactory total of 72,880 lire.

VICENZA.

Vicenza is a town of about 40,000 inhabitants, situated near Padua. As in the latter city and Venice, the gas supply was in the hands of the *Società Civile Lionese* since the year 1845. This corporation had made a net profit of from 50,000–60,000 lire ($10,000–$12,000) on an annual sale of 480,000 cubic meters at the exorbitant price of 40 centesimi per cubic meter ($2.27 per 1000).

When the question of renewing the franchise, which expired in May, 1897, came up, the municipality decided to follow the example of Padua and municipalize this important service. The plants and pipes were bought for 165,000 lire ($33,000)—a somewhat exhorbitant sum, as the pipe system was defective, causing each year a leakage of 70,000 cubic meters. Under municipal administration, the production of gas increased from 480,000 to 560,000 cubic meters and the price was reduced first to 30 centesimi ($1.70 per 1000) and then to 22 centesimi per cubic meter ($1.25 per 1000) for private consumers and 18½ ($1.05 per 1000) for public use. The present prices are 25 and 20 centesimi respectively owing to the rise in the price of coal. Meter rents have been reduced almost one-half. Notwithstanding these large reductions, the municipality in 1898 cleared a profit of 25,000 lire ($5,000); in 1899, only about $2,000 owing to the increase in the price of coal. Further, the cost of public lighting under municipal management has gone down from 45,000 lire to about 27,000 lire (from $9,000 to $5,400).

Following the example of Como and Padua, the municipality of Vicenza turned over the management of its gas department to a director and administrative commission, the latter composed of the mayor and four other members, two of whom are municipal councilors. But just as in Padua, it has now been found to be more convenient to entrust the entire management to a responsible director, so that the latest scheme for reforming the municipalized services—gas supply, water, electric light and motive power—proposes to put the combined services in charge of a single technical expert who is to be responsible for their proper management.

Under municipal management, a part of the gas mains was laid by direct labor, the city hiring and supervising the laborers, at an expense as low as 64.5 lire ($1.30) per meter; while the normal cost under the contract system would have been 8 lire ($2.00) per meter. Twenty-three men are employed at the works who labor under the same unsatisfactory conditions as fixed by the *Società Lionese*—a work day of 12 hours and very low wages. Firemen receive only 2.40 lire ($.48) per day, and wages in private establishments are higher.

With municipal operation, a noteworthy increase in the total quantity of gas consumed, as well as the number of consumers took place, but the use of gas did not extend to the poor classes, possibly

because installations were not made gratuitously. The introduction of penny-in-the-slot meters was proposed, though not sanctioned, as these meters did not meet with success in Milan and other large Italian cities. Gas is yet but little used for heating purposes.

The service also has been much improved from the technical standpoint. The illuminating power has not been changed, owing to the probable general use of the Auer mantels. Instead, attempts have been made to purify the gas by eliminating as far as possible the presence of sulphurated hydrogen and to improve condensation. A new gas-holder is now under construction, and to prevent leakage and to make possible a higher pressure, the mains are being renovated. During the year 1900 about 6000 meters will be laid at an estimated expenditure of 150,000 lire. When these changes have been accomplished it will be possible to stimulate a further increase in consumption and bring about more satisfactory fiscal results.[1]

ASTI.

The contract made with the *Società Italiana del gas* in 1883 terminated November 15, 1898, when the gas plant and pipe lines became municipal property. As this date approached, the municipality received various offers for the franchise, and even proposals to organize the gas consumers into a co-operative society. But the municipality, after a prolonged investigation undertaken by the mayor and municipal board into the advantages and inconveniences of various systems of administration, decided to inaugurate municipal service. After long and wearisome negotiations the company agreed to accept 28,775 lire for the works, including the mains, the material on hand and the gas meters rented to private individuals. The works were in the worst possible condition and the city immediately set about to improve them, introducing modern methods and new machinery.

The financial results have been all that could be desired. The actual receipts have proved larger and the expenditures less than estimated, leaving a net profit of 15,000 lire ($3,000). Consumption increased 100,000 cubic meters within a year and the number of consumers 353. The price of gas has been reduced from 25 to 20 centesimi ($1.42 to $1.13 per 1000) for private

[1] For information regarding the municipal plant at Vicenza, the writer is greatly indebted to the courtesy of the director, Mr. Vittorio Carli.

lighting and to 16 centesimi (90.6 cents per 1000) for public lighting and power.

The salaries of the workmen have been increased and are continued during sickness. A fund for insuring workingmen against accidents has also been started, and old age pensions will probably soon be adopted. Aiming to raise the efficiency of the force, the technical manager has been allowed a certain share of the profits over and above his salary, and a plan is now under way whereby the ordinary workmen will secure the benefits of a system of profit sharing.

BOLONGA.

The city of Bologna (population in 1897—153,206) granted a franchise in 1862 to the *Compagnie Genèvoise de l'industrie du gas*, which was to terminate November 28, 1912. According to this agreement the company supplied gas until recently on the following terms:

For street lighting, .32 lire per cubic meter ($1.80 per 1000).
Private consumers
for lighting .25 " " " ($1.41 ").
for heating .23 " " " ($1.30 ").
for laundry use .21 " " " ($1.19 ").

Early in 1900, Mayor Alberto Dallalio, who has repeatedly expressed his belief in municipal ownership, perfected negotiations with the company for the transfer of the plant to the city. On May 2, the municipal council approved the agreement by a vote of 52 to 17, and the city assumed possession of the works on July 1, paying the company $750,000 for the works and $400,000 for the franchise—$1,150,000.

The Bologna municipal plant is by far the largest public plant in Italy. The great cost has made many doubt the advisability of the undertaking, and maintain that it would have been more advantageous for the city to have waited until the expiration of the franchise in 1912 and then purchased the plant at a very low price or constructed new works possessing all the latest improvements and the most modern processes. Others fear the competition of electricity.

PROJECTS OF MUNICIPALIZATION.

In view of the approaching expiration of the franchise of the private gas company, a strong agitation in favor of municipalization has sprung up in Leghorn (*Livorno*), Tuscany, a city with

over 100,000 population. Within the municipal council, the plan is advocated mainly by the Radicals, Republicans and Socialists. Members of the moderate parties are more or less opposed. The question has become a party issue, and most likely the government, availing itself of a power not possessed in many other countries, will dissolve the council. New elections will then be held with municipalization of gas as the paramount issue.

In Turin, one of the largest Italian cities, with a population of over 350,000 inhabitants, the supply of gas is in the hands of two private companies, between which, however, there is no competition whatever. These two companies hold franchises to use the streets expiring in 1923, but the contract for public lighting runs for a short period and terminates in 1901. For many years, both in the press and in the council chamber, a municipal plant has been advocated which would compete with the private companies until the expiration of the franchise and then would assume the entire service. Preliminary investigations have been made and the scheme has been favorably reported upon by a finance commission appointed in December, 1896. Such a plant would hardly become a source of revenue, as both companies founded long ago have by this time paid off the greater part of their capital and could thus quite easily afford to reduce the price in order to crush the municipal plant. The benefit to the citizens at large, however, might be sufficient to warrant the venture. The agitation in favor of municipalization has recently become stronger, as the companies have increased the price of gas, beginning with October 1, owing to the coal crisis.

By the time these pages are printed, the construction of a municipal water-gas plant will probably have been begun in Casteggio, a small town of Lombardy with a few thousand inhabitants. The small size of the town adds special importance to this experiment in municipal activity, which is perhaps the first attempt to introduce in Italy the use of water gas. The municipality appointed some time ago a special technical commission for the examination of the question, which recommended the use of water gas. The experiments made in June, 1900, gave very satisfactory results, so it is likely that the coming year will see the installation of the plant.

The above constitute all the municipal gas plants in Italy. With the exception of Spezia, all are of recent origin, so that it is

not yet possible to give a positive opinion as to their permanent success and their fiscal and social consequences. However, the results obtained in these first years of municipal operation permit the hope that in Italy as well as elsewhere the municipality may gradually acquire new functions and find for itself new fields of activity. The larger plants—those of Como and Padua—have shown great development under municipal management and operation. These municipalities have boldly adopted new technical methods, proving the utter fallacy of the old prejudice, viz., that public management was averse to all progress. It would, however, be but fair to say that the principal factor which urges the Italian municipalities along this new road is the need of larger incomes. Most of the cities are in a deplorable financial condition. Moreover, the Italian system of local taxation is based mainly on an indirect tax, unfair and burdensome to the poorer classes, the taxes on consumption (*octroi*). Municipalization seems to offer a solution by opening up a new source of revenue, which would also enable the municipal authorities to lighten somewhat the heavy tax-burden which now rests so heavily on the working classes.

MUNICIPAL ELECTRIC LIGHTING IN DETROIT.

By John A. Fairlie.

The Detroit municipal electric lighting plant was inaugurated in 1895 and has now been in operation for five years. Except Chicago, it is the largest municipal plant in this country; and the results of five years' experience under a municipal system as compared with the previous system of contract lighting should be of wide interest and value.

A brief historical sketch of electric lighting in Detroit under both private and municipal management will serve to introduce the discussion on the comparative results of the two systems. Electric lighting was first introduced in Detroit in 1882; the following year an experimental contract was made by the city for lighting two of the principal streets; and in 1884 the contract for the entire public lighting of the city was awarded to the electric light company. Three hundred arc lamps of 2000 candle power each were employed; but in place of single lamps at frequent intervals, these were grouped in seventy-two towers from 100 to 250 feet in height. For these the city paid at the rate of $240 for each arc lamp. Yearly contracts were made with the same company for each of the next five years, the number of arc lamps increasing steadily to 719 in 1890, and the cost per lamp falling by stages to $191 in the same year. In 1890 another company underbid the first company, and a three years' contract was made with the new concern at approximately $130 a lamp. The number of lamps was increased at once to over one thousand, and by 1894 there were 1279 arc lamps in use in the public streets. A large number of single lamps were now used in addition to the tower groups.

In the spring of 1893 proposals for a new contract for public lighting were invited. The only bid received was from the company then lighting the city, which submitted a schedule of rates varying from $155.73 per lamp for a one year contract, to $124.10

for a three year contract, and $102.20 for a ten year contract. The project for a municipal lighting plant was already under serious consideration; and on the recommendation of the comptroller, the proposal was rejected by the common council on March 14. Afterwards the public lighting commission made arrangements with the company to continue its lights pending the introduction of the municipal plant at a sum which averaged about $132 per arc lamp.[1]

MUNICIPAL PLANT CONSTRUCTED.

Agitation for municipal lighting had been begun as early as January, 1890, by Mayor H. S. Pingree in his first message to the common council. In each of his subsequent annual messages in 1891, 1892 and 1893, the mayor again urged the building of a municipal plant, and presented data and arguments in support of this project. In 1893 a bill authorizing the city to establish municipal lighting was introduced in the state legislature, which was passed and became law March 18. April 3, under the provisions of the act, the question was submitted to the electors of the city, who voted 15,282 to 1,245 in favor of a municipal plant. A public lighting commission of six members was at once appointed, and bonds to the amount of $600,000 authorized, and in time sold, to defray the cost of erecting the new plant. A convenient site on the river front was selected for the central station, a neat but not extravagant building constructed, and the necessary equipment of machinery installed. An underground (conduit) system of distribution was built for the district within a half mile of the city hall, and beyond that the system of overhead wires was continued.

[1] STATISTICS OF PUBLIC LIGHTING IN DETROIT BY PRIVATE COMPANIES.

Year ending June 30.	No. of Lamps.	Amount Paid.	Cost per Lamp.
1884	24	$3,649.53	$152.07
1885	300	71,982.00	239.94
1886	382	91,570.97	239.71
1887	565	115,490.26	204.41
1888	608	117,370 18	193.04
1889	702	128,068,78	182.42
1890	719	137,937.30	191.84
1891	1031	133,716.55	129 69
1892	1168	152,282.70	130.38
1893	1279	164,830.91	128.87
1894	1279	169,360 35	132.41
1895		153,004.36	
1896		28,796.41	

April 1, 1895, the commission began operating that portion of the new system in the district covered by the underground conduits. Extensions of the service were made rapidly during the following months, and by October, the entire public lighting was furnished by the municipal plant. There was at that time 1470 arc lamps mainly employed in street lighting, and 2456 incandescent lamps in the different municipal buildings. The system has continued to extend until on June 30, 1900, there were 2002 arc lamps and 6679 incandescent lamps in the municipal system of lighting; 440 arc lamps were grouped on 138 towers, but the greater number are now distributed in single locations.

FINANCES OF PLANT.

As a basis for comparison and discussion, the following tables showing the cost of lighting are presented from the reports of the public lighting commission. They include in the cost not only the operating expenses of the plant, but charges for interest on the investment, for annual depreciation of the plant, and for municipal taxes which would be collected were the plant owned by a private corporation. The items for operating expenses and interest on the investment present no difficult problems. The charge for lost taxes is estimated by charging the regular rate of taxation for city, county and state purposes on a valuation assessed on the same basis as other similar plants in the city; the assessed value of the municipal plant being about one half of the net investment. The charge for depreciation is made on the net investment at the rate of three per cent. The amounts charged for these two items seem to be reasonably adequate.

In some respects the figures given below vary from the statements in the reports of the commission. For the first two years, no attempt was made to include the items outside of operating expenses necessary to calculate the annual cost of the plant; and in 1897 the commission argued that the only item of depreciation that should be considered was on the cost of the boilers, as the rest of the plant was maintained in perfect condition by expenditures for repairs. But in the later reports the items of interest, depreciation and lost taxes have been considered as shown; and the corresponding data for 1896 and 1897 have been compiled by the writer on the same basis as the figures of the commission for subsequent years.

Again in their last report, after estimating the cost in the same form and with almost precisely the same results as in the table below, the commission presents a supplementary statement of items amounting to $10,000 which would reduce still further the total cost. At least some of these items might in fairness be deducted. The work of the commission has absorbed the former municipal supervision over private lighting companies, and their expenses thus include a certain amount chargeable to the general expenses of the city. The department also collects various sums of money for rentals and sale of old materials, which reduce the net expenses, but are not deducted from the total operating expenses. These items, however, have not been deducted in this paper, because they are not given for the years before 1900, and it seems better to present all the figures on the same basis. The effect of this is equivalent to increasing the allowance for depreciation.

FINANCIAL RESULTS OF THE DETROIT MUNICIPAL LIGHTING PLANT.

YEAR ENDING JUNE 30.	1896 9 MONTHS.	1897.	1898.	1899.	1900.
Capital expenditure.					
Total outlay.....	$640,130.85	$729,222.78	$790,145.78	$813,808.47	$828,088.00
Less depreciation allowances.....	.....	714,848.76	750,000.00	751,157.74	742,907.56
Annual Cost.					
Operating expenses	82,803.36	110 141.38	99,713.18	96,665.03	90,087.78
Interest at 4%	18,203.92	28,593.75	30,000.00	30,046.28	[1] 29.716.28
Depreciation at 3%..	14,402.94	21,445.80	22 500.00	22,534.71	22,287.22
Lost Taxes.....	4,800.00	7,981.43	8,368.00	7,828.00	7,013.06
Total.....	$120.210.22	$168,161.86	$160,581.18	$157,074.02	$149,104.28
No. of arc lamps.	1483	1564	1744	1868	1,963
No. of inc. lamps.	2456	3064	3901	4911	6,679
Kilowatt Hours.					
Arc lamps.....	2,108,680	2,716,628	2,975,019	3,182,293	3,327,453
Incandescent lamps.	177,548	263,784	306,596	357,274	461,597
Distribution of Cost.					
Arc lamps.....	$109,984.36	$153,174.14	$145,573 58	$141,256.00	$130,939.95
Incandescent lamps	10,235.86	14,987.68	15,007.60	15,818.02	18,164.33
Cost per arc lamp.	$74.16 (9 ms).	$100.50	$83.46	$75.62	$66.81
Cost per Kilowatt Hour.	98.88 per yr. $.052	$.056	$ .049	$.044	$ .040

[1] The Commission estimate the interest on the net investment at the beginning of the year ($738,623), but the new investment should be charged with interest for at least part of the year, and it seems better, to follow the method of former years and calculate the interest on the net investment at the end of the year.

RESULTS OF MUNICIPAL OWNERSHIP.

The first and clearest deduction from these figures is that the municipal plant has furnished public lighting to Detroit for a much smaller expenditure than would have been required under any alternative presented in the bid of the private company in 1893. The lowest rate proposed by the private company was $102.20 per arc lamp for a ten-year contract. The municipal plant furnished lights at appreciably less than this figure from the outset; and during the last three years the cost has fallen steadily until it is now less than two-thirds of the minimum price demanded by the company, with a probability of still further reductions before the ten year contract necessary to secure the minimum price would have expired. The direct financial results have thus fully justified the city of Detroit in establishing a municipal system of electric lighting.

Moreover, other beneficial results have followed from the new system. The rapid extension in the number of lights may be ascribed to the reduction in cost, which has allowed a smaller total expenditure to provide a large increase in the amount of lighting. But along with the increase in number of lamps, there has gone a noticeable improvement in the quality of the service, as indicated by the great decrease in number of lamps reported out by the police. In 1893–4, under the contract system, the total number of lamp-hours reported out was 86,426; since the municipal works have been in full operation, the largest number of lamp-hours out in one year has been 7,465.

DETROIT COMPARED WITH OTHER CITIES.

It must not be supposed that the conclusions thus far reached offer any basis for a generalization in favor of municipal lighting. The only fact shown is that Detroit has in the past five years secured better and cheaper lighting under its municipal system than could have been secured by a contract made in 1893. May it not be, however, that these results have been gained through improvements in electric lighting since 1893 which are not likely to be duplicated; so that while compared with the alternative of 1893 Detroit has gained, a private company might now offer lower prices than the city is paying. A decisive answer to this query is not easy to find. But it is possible to obtain some light on the subject by comparing the cost of Detroit lighting with the prices charged by

private companies for public lighting in other cities. There is an abundant supply of materi l for making such a comparison in the recently published report of the Commissioner of Labor on Water, Gas and Electric Lighting Plants. The statistics given on this report are for various dates from 1897 to 1899; and the Detroit report for the year ending June 30, 1898, will correspond most nearly to these varying dates.

For the year 1897-8, the cost of the Detroit municipal plant was at the rate of $83.46 for each arc lamp for 3786 hours in the year, or $.049 per kilowatt hour. An examination of the summary tables in the Labor Commissioner's report shows that no group of private companies charged for public lighting less than $.0514 per kilowatt hour; and that, when the hours of service are considered, no group charged so low a price per arc lamp as the cost in Detroit. From the detailed tables showing the statistics for each plant, the following table has been compiled including all the private plants reported which furnished 500 or more arc lamps for public lighting:

STATISTICS OF PUBLIC LIGHTING BY PRIVATE CORPORATIONS.

Plant Number.	Number of public arc lamps.	Hours of service.	Price per lamp per year.	Price per kilowatt hour.[1]	Total Investment in Plant.
889	860	4000	$147.93	$.0800	$609 129
893	513	3900	100 00	.0888	473,621
915	916	2216	74.50	.0731	450,000
918	1243	3988	120.34	.0631	664,267
922	984	3988	91.25	.0416	1,752,552
924	538	4000	138 70	.0771	875 335
925	510	4650	146.00	.0654	1,591 801
931	1173	3000	85 00	.0630	800.847
932	626	3960	85.00	.0477	1,170,859
933	1279	4000	91 25	.0507	1,250,000
934	860	3953	104 84	.0479	2,600 000
935	674	3878	75.00	.0569	836.157
936	2500	4000	100.00	.0500	1,975 000
937	927	3888	93.24	.0500	2.107,660
939	800	2685	103.00	.0833	1,341,100
940	958	3966	100.38	.0634	1,845,569
941	1390	4000	127.50	.0708	4.157.354
942	830	4000	116.27	.0781	850.000
943	702	3855	102.70	.0595	1,475,000
944	3647	4000	97.97	.0500	2,040 000
947	652	3210	176.55	.1273	2,773,904
948	2276	3940	127.31	.0630	3.145,541
949	1216	4000	86.09	.0476	2,683.875
951	2072	4000	96.09	.0505	1,961.551

[1] It should be noted that the figures of cost given in Tables 10 and 11 of the Commissioner of Labor's Report for municipal plants cannot be compared with the prices charged by private companies, given in the same tables. The cost for municipal plants does not include estimates for lost taxes or interest (see p. 549 of Report); and in some cases no adequate charge is made for depreciation. The estimated charges for lost taxes and interest are presented in Table 8; and it is difficult to understand why with this data at hand the serious error should have been made of leaving it out of consideration in computing the cost per arc light and per kilowatt hour.

It will be noticed that four of the twenty-four plants furnished lights at lower prices per kilowatt hour than the cost in Detroit for 1898, and that five others furnished lights at prices but slightly in excess; while in the remaining thirteen cases the prices are distinctly higher than the cost in Detroit.

These facts indicate that the city of Detroit has secured its public lighting through its municipal plant not only for much less than could have been obtained by contract in 1893, but also on terms which compare favorably with the lowest prices charged by private companies in other cities. It cannot be claimed, however, that the Detroit municipal rate shows any large advantage over the lowest private rates, while in one city a private company furnishes public lights at a price one-sixth lower than the Detroit lights cost. It should be remembered that the private companies have an important advantage in supplying electricity to private consumers within the same area as the public lighting, thus securing the economies of manufacture and distribution on a larger scale. If the Detroit municipal plant supplied the private demand, undoubtedly the cost of city lighting would be still further reduced. But viewing the existing situation, the fact of some private rates lower than the Detroit municipal rate must be recognized.

This comparison has been made on the basis of the cost of Detroit lighting for 1898. If the striking reductions in the Detroit figures during the last two years have been in large measure confined to this city, the cost of lighting has been reduced below the price charged by any private company in the above table, and the success of the municipal plant is strongly emphasized. It is probable, however, that at least some important reductions have been made at the same time in the cost and price of public lighting in other cities; and in the absence of definite data of recent date, for any large number of cities, it is not possible to make accurate deductions as to the comparative significance of the cost of Detroit lighting for the last two years.

The entire responsibility for the management of the Detroit lighting plant rests with the public lighting commission; and this paper would be incomplete without noting the character and methods of the commission, which have been essential factors in the success of the municipal plant. The commission consists of six members appointed by the mayor of the city with the consent of the council. These serve without salary for six year terms, one member retiring each year. This organization offers certain

advantages. The gradual renewal of the membership serves to ensure a continuous tradition and a steady policy in the management, while the absence of salary probably lessens the pressure of professional place hunters far appointments. But it is not everywhere an easy matter to find efficient commissioners for such boards; and the Detroit experiment has been highly favored in securing as members of the commission active business men who have been both able and willing to devote a large amount of time to this work. The character of the members can best be illustrated by the methods adopted.

In the first place the commissioners take an active personal part in the management. During the last two years the work of making purchases and contracts for supplies has been performed directly by committees of the board; and the savings made by this system account in large part for the reduction in operating expenses during these years. In the second place, the other expenditures have been throughout on a conservative and business basis. No expensive buildings have been constructed, and no extravagant salaries are paid. The general superintendent receives $2000 a year, two other officers have $1200 a year, and no others over $1000 a year. Yet the wages of the men are as high as in any business concern, and the eight hour day is in force. In the third place the tenure of positions are dependent solely upon efficiency, and a system of promotion in service according to merit and fitness for the work is employed.

In brief, this honorary commission manages the municipal lighting plant precisely as a board of directors would conduct the affairs of a well managed private corporation. Directors usually have a large pecuniary interest in the corporations which explains their active work for its financial success. Unsalaried boards of managers have, however, proven effective in the administration of educational and charitable institutions, both public and private, mainly on account of the philanthropic interest attached to the work. In our national administration, too, the dignity of a position in the president's cabinet secures for the direction of the army, navy and post-office, men whose services command in the business world many times the salary they receive from the government. A city which finds men willing to perform similar honorary service in the administration of a purely economic function has certainly made long strides towards the realization of municipal ideals.

BOOK REVIEWS.

FINANCES OF PARIS.

Les Finances de la Ville de Paris de 1798 à 1900. Par GASTON CADOUX. Paris, Berger-Levrault & Cie., 1900. 8vo, 828 pp. Paper, 15 frs.

This book is probably the most extensive and elaborate study which has yet been made concerning the finances of any city. In fact, from the standpoint of the scientific student of finance as well as from that of the general reader, its great length and its extreme detail will even appear to be a fault. The work is much better suited to the use of the technical municipal administrator, and for such it was doubtless primarily intended. The author is himself a prominent officer in the actual financial administration of Paris, being secretary of the budget committee of the municipal council, and also secretary of the loan commission. His opportunities for obtaining facts have been the most complete. It is but natural that he should have been led, especially with a view to enlightening the officials of the city themselves, to present an enormous mass of details, which must seem to most readers wearisome, often confusing, and sometimes even absurd. Moreover the official position, as well as the apparent aim of the author, doubtless account for the fact that he has taken for granted, to a degree which is inconvenient at least to the foreigner, that the general organization of the city government, its history, and its relations to the state, are familiar to his readers. He fails to point out sufficiently the connection of the finances with other phases of the administration, and especially with the actual conditions and vicissitudes of municipal and state politics.

A final fault which may be found with the book before us is the almost entire absence of scientific theory and criticism. A few questions pertaining to the finances are indeed critically discussed, but for the most part our author preserves what he perhaps, in view of his official position, considers a discreet silence. This omission is the more noticeable because, with all its excellencies, there is much in the management of the municipal purse of Paris which scarcely conforms to well recognized canons of finance.

Despite these perhaps unavoidable defects, M. Cadoux's work is of very great value from every point of view. It makes accessible a vast mine of material as to the administration of the French capital, an administration which, by its remarkable successes, as well as by its occasional errors, furnishes so much of interest and instruction as to the art of municipal housekeeping. Indeed, we could wish that a summary of the entire book might be published in English for the benefit of those interested in good city government.

The first part of the book is historical. It describes the financial operations of *ancien* Paris, from 1798 to 1860, and, in greater detail, of modern Paris. Our author criticises very severely the extravagance, and especially the reckless methods of financiering, of the famous administration of Baron Haussmann as prefect of the Seine, from

1850 to 1870. Though Haussmann did so much to transform Paris into its modern dignity and beauty, he left the city burdened with a debt of 1,475,000,000 francs, large sums of which were in the form of floating obligations. The debt was further rapidly swelled during the terrible period of the siege and the commune, and by 1875 had reached a figure not greatly less than its present amount. Immediately after the establishment of the Republic, however, the capital was given an elective municipal council, in place of the appointed body which had hitherto been the pliant tool of the prefect of the Seine. This body, with all its weakness and its faults, has helped much toward the good government of Paris; and under its influence the finances of the city have moved on smoothly, without corruption, and with few changes in policy—a fact which makes the financial history somewhat uninteresting to the American, accustomed to the exciting play of party politics and corrupt rings in city affairs.

M. Cadoux, like most Parisians, evidently feels that the city council still has too little power over against the central government. His description of the method of voting the annual budgets shows clearly how powerful is the influence of the two chief executive officers, the prefect of the Seine and the prefect of the police, both appointed by the national authorities. These officers prepare the estimates of receipts and expenditures, and must be mainly relied upon for information. While the city council apparently gives more careful consideration to the budget than most American municipal legislatures do, it still complains that it has too little opportunity for deliberation and for securing information, and too little power. The national government indeed compels the inscription of not a few items in the budget; this is notably true of the expenditure for the police. Various financial measures proposed by the city require sanction by the state government; for example, all loans are authorized by special acts of the legislature.

The debt of Paris is enormous. M. Cadoux, somewhat curiously, treats the total of future interest as part of the present debt, and thus finds the entire amount of municipal obligations to be 4,889,000,000 francs or in round numbers $980,000,000. This includes the large sums to be paid as premiums or special allotments on the basis of periodical drawings among the creditors, in accordance with the common French custom. While the city has indeed much to show for money raised by loans, the annual charge of $23,000,000 for debt service, constituting more than one-third of the normal expenditure, is certainly a heavy one. We may at any rate question (a thing which our author almost wholly fails to do) the wisdom of the Parisian practice of making the usual term of municipal obligations 75 years. Certainly many, though of course not all, of the public works for which loans have been incurred will require great additional outlay, and perhaps entire reconstruction, long before the bonds originally issued have been redeemed. The most commendable feature of the debt management in Paris is the universal application of the principle of gradual and automatic redemption by including a part of the principal with each interest payment.

The tax system of Paris is far from satisfactory. The chief reliance is upon the octroi—consumption taxes levied on commodities brought into the city. More than half of the entire city revenues, and five-sixths of the revenues from taxation, come from this source, estimated for 1900 to produce over $32,000,000. The octroi represent a burden of about $12 yearly per capita. Our author presents an interesting table showing how much these taxes add to the prices of articles of common consumption. Ordinary grades of meat and fish pay from one to two cents per pound; butter and oleomargarine, one and one-half cents; coal and coke about seven cents per 100 pounds; while the rate on petroleum no less than nine cents per gallon. It is obvious that these taxes are unjust to the poorer classes. Fortunately a strong movement is

under way for the substitution of other methods of taxation. Perhaps the most original and constructive part of the book before us is the discussion of these proposals. We may however question to what extent it is possible or just to carry out the suggestion made by our author himself, that special taxes, such as those already collected for street cleaning and for the use of sewers, be levied upon those classes particularly benefited by various public activities. The element of common benefit from all these services must not be underestimated.

Aside from the octroi, and the special taxes just mentioned, the other taxes in Paris are merely percentages added to the state imposts and collected by state officers. Far more interesting are the various receipts from public works and franchises. The gross revenue from these sources is more than $14,000,000, or 22.5 per cent of the entire municipal income. While this sum is not materially greater than New York obtains from similar sources, the net income, after deducting expenditures, is very much larger in the French metropolis than in New York. Unfortunately M. Cadoux does not bring the receipts and expenditures of these various services side by side, and entirely fails to present figures for the cost of debt service connected with particular enterprises. I have compiled the following table regarding the receipts and expenditures according to the budget of 1900.

	Gross receipts.	Expenditures except for debt service.
Public markets	$1,801 000	$705,700
Abattoirs	768.800	
Entrepots for wine and other products	384 600	75,100
Water supply and canals	8,584,600	1,161,500
Sewers, excluding tax	448,100	996 100
Cemeteries	477,100	849,300
Other city property	415,600	No expenditures properly corresponding.
Locations upon streets and in parks	882,100	
Cabs, omnibuses and street railways	1,644.000	
Other uses of streets	211,700	
Gas company	2,730,800	

Judging from the indications which are available as to the capital cost of the various revenue-earning enterprises of Paris, there is a net profit, over and above the interest on the capital invested, of from one-fourth to one-half of the gross receipts, from each of those services which involve outlay, except in the case of the water supply and the sewer system, which, in accordance with just financial principles, are made barely to pay their own charges. The receipts from the use of streets, from vehicles and street railways, and from the gas company, are especially noteworthy, though the large revenue from the latter source is partly at the expense of a very high price to consumers for gas.

The total ordinary expenditure of Paris for 1900 is about $62,000,000. The increase in outlay for the past 25 years has been moderate; the per capita amount rising from $20 in 1876 to $23 in 1900. The per capita expenditure of New York City, to be sure, decreased from $28 in 1869 to $24.60 in 1880 and $23 in 1896; but the figures for the earlier years in our own metropolis were excessively swollen by corruption. The most striking of the separate items of the Paris budget are these: the immensely rapid increase in the expenditure for public education, and the great variety of forms of technical and advanced instruction now offered by the city; the comparative moderateness of the sums spent for keeping up the splendid streets, boulevards and parks, and the still more excellent street cleaning service; the considerable expenditures for en-

couraging the fine arts; and the relatively large outlay for public charities of various sorts.

Perhaps the most interesting feature of M. Cadoux's book is the concluding essay on the comparative financial statistics of leading cities throughout the world. While he confesses that the wide differences in conditions make it difficult to draw conclusions from the statistics, and while the different methods of accounting make the figures themselves often incomparable or of doubtful accuracy, an immense amount of valuable information is given. An illustration of the difficulty of comparison is seen in the fact that M. Cadoux's figure for the debt of Paris, by including future interest, appears unduly large as compared with the statistics of other cities. Again we notice that Greater New York is said to have an annual debt charge of no less than $40,000,000. This sum is much too large, but it is little wonder that our author was unable to disentangle the correct figure from among the infinite complexities of the financial statements of the great American city.

Within the limited space of a review it is impossible to comment further on the many important facts brought forth in this book. It is to be hoped that studies of a character somewhat similar to that which M. Cadoux has given us for the French capital may soon be forth-coming concerning the financies of our own leading cities, as well as of those of other countries. Nothing can contribute more to promote good city administration than thorough knowledge regarding the financial experiences of other municipalities.

Washington, D. C. E. DANA DURAND.

POLITICS AND ADMINISTRATION.

Politics and Administration. By FRANK J. GOODNOW, A.M., LL.D. New York, The Macmillan Company, 1900. 12 mo, 270 pp. Cloth, $1.50.

If a modern publicist were asked what was the most important change taking place in the internal politics of America at the present time, he might well answer, the increase in the importance of executive power. No other development in our political life can compare with the unprecedented extension of administrative functions within recent years. The causes of this extension are largely, if not wholly, economic in character, and for this reason, perhaps, the change has taken place gradually and almost unconsciously. Professor Goodnow's attention was early attracted to the new development, and he has given us a series of valuable books upon the subject. In all of these works the dominant thought is the increasing importance of administrative functions in government, so that Professor Goodnow, more than any other American, may be said to represent administrative science. In his latest work he has attempted to show the relation of administration to politics and the reciprocal influences of these forms of activity on each other. "Politics has to do with policies or expressions of the state will. Administration has to do with the execution of these policies." (Page 18).

After discussing in Chapter I the necessity of describing the actual as well as the nominal or formal sides of American government, the author explains in Chapter II how the making and enforcement of the law must harmonize with each other. The administrative side must be subordinate to the political. Parties have a two-fold object; first, to secure the expression of the popular will in making laws, and second, to control in a general way the sympathetic execution of these laws, that is, the administration. Now, in America parties not only control administration in a general way, but they actually carry on the administration in detail. Nearly all administrative

officers have therefore become political in character. As a result of this attempt of the party to perform more work than it should, American parties are no longer responsible to the people except in times of crises. In order to carry on the gigantic work which Americans have imposed on it, the party has been so strengthened and centralized that practically all power has been taken from the individual members of the party and placed in the head or "boss." This is especially the case where the administrative organization of the government is decentralized. In these cases each local official elected by the people must be controlled by the party and this can only be done by a thoroughly organized semi-military type of party; hence the growth of "boss" government which is notoriously irresponsible. The author devotes two chapters (VIII and IX) to "The Boss" and the "Responsibility of Parties," respectively. These portions of the work are full of valuable and suggestive thought. By far the most interesting part of the book, however, is the last chapter, in which Professor Goodnow draws his conclusions. The first thought is that a thorough centralization of the administration is necessary in order to make it possible for the latter to become efficient and to attain some slight degree of independence over absolute party domination. Civil service reform has been preceded by administrative centralization. Only with this centralization has there come the possibility that one man may be held responsible for the use of administrative power. The president in the United States and the mayor in the city have each, in his sphere, come to be held accountable for the execution of the laws.

The second conclusion is that centralization is not enough of itself to insure responsibility to the people or popular government. In order to secure popular government we must give some definite legal recognition to the party and to the party boss. This has been accomplished in England by the union of the executive and legislative powers of the government, but the author declares such a union to be practically impossible in the United States, owing to our deep rooted admiration for the theory of the separation of powers. Such a union, if it is to take place at all, must be effected through the party. Professor Goodnow believes that the party boss may be made responsible to the party largely through legal regulation of party primaries in such way as to secure the rights of the individual member of the party, and by laws requiring full publicity of all disbursements of money. He also points to the effects of the referendum in securing the separate judgment of the people on each question submitted to them, thus avoiding that wholesale acceptance of obnoxious party platforms which is necessary at the present time in order to secure the adoption of one desirable plank. Striking instances of this evil are seen in the platforms of both parties during the recent campaign. The changes suggested by Professor Goodnow would doubtless be of great assistance in improving our political conditions. The centralization of our administrative organization in state and city along the lines already marked out in some recent laws would prove especially helpful in this respect, as would also the adoption of the referendum. But if we are to stop here, our fundamental political evils will still remain. The great question which Professor Goodnow has not entirely solved is, How shall the party leader be made responsible? There appears at present to be only one way to do this, viz., by inducing him to accept office. No system of *primaries* yet invented can deprive the leader of his despotic power, nor render him responsible to any considerable degree. We are living in an age of highly concentrated power, and to render the holders of power responsible we must force them to become candidates before the people. Professor Goodnow admits that a union of the executive and legislative powers must take place under the control of the leader, but thinks that such a union in America must be accomplished inside the party. Unless some hitherto

unknown means of making the boss responsible to the party is discovered, however, the abandonment of the theory of separation of powers will be forced upon us. It is in reality less a question of abandoning this theory than of recognizing that we have already abandoned it in substance. Those who are interested in these important practical aspects of our political institutions will find additional discussions of the subject in Henry J. Ford's valuable book, "The Rise and Growth of American Politics," Clinton Rogers Woodruff's article "American Political Methods," in the Political Science Quarterly, June, 1900, and in the reviewer's "Liberty *versus* Efficiency," Yale Review, November, 1899.

University of Pennsylvania. JAMES T. YOUNG.

MUNICIPALIZATION IN THE UNITED STATES.

Fourteenth Annual Report of the Commissioner of Labor, 1899. *Water, Gas, and Electric-Light Plants under Private and Municipal Ownership.* Washington, 1900. 8 vo, 988 pp.

This report calls for only a brief notice, because the work is already in the hands of every person who is deeply interested in the controverted subject of private versus municipal ownership and control of public service industries. The volume which the Department has given us contains the formulated results of the first attempt that has ever been made to collect and collate the statistics of all the water, gas and electric plants in the country, with the definite purpose of throwing some light upon this question. With the co-operation of the various state bureaus of labor, there have been brought together approximately the statistics of twenty-five per cent of the private and thirty-seven per cent of the municipal water-works; thirty-eight per cent of the private and seventy-nine per cent of the municipal gas-works; and twenty-five per cent of the private and seventy per cent of the municipal electric light plants of the country. So that it may be assumed that the report represents all that can be done under existing conditions to collect statistics of this kind covering the entire country.

As a whole, the results accomplished will prove a disappointment to many who had hoped to find the relative merits of the two systems of public service determined by this investigation. The report frankly recognizes that the facts presented do not and cannot settle this question conclusively, and it may as well be said that students of this problem realized before the report was prepared that under present conditions no other conclusion could be expected. If the report is to exert a beneficial influence upon the discussion of the problem which it undertook to solve, it will come through the acceptance of this fact that the statistical argument at best is inconclusive and misleading. But it is in the failure of many of those who may make use of the report to realize this fact that the danger lies. In the analyses of the several tables, certain generalizations are made concerning the relative cost and price of service under private and municipal control which tend to show the superiority of the latter system. Assuming that the statistics are in all cases correct, we may well doubt in several instances whether the superior showing of the one system in a given group is not due primarily to a failure to include a number of plants under each system sufficient to make the comparison valid. While these limitations are recognized in the report itself and will be accepted by all persons accustomed to the use of statistics, we may look for the appearance in the near future of a flood of ill-considered statements based upon the apparent showing of these comparative tables and supported by the authority of quotations from the analyses.

The statement of the report that the statistics of individual plants, moreover, may

not always be reliable can be readily accepted by those who understand the uniform weakness in the methods of book-keeping in the smaller cities and villages and the unwillingness, on the other hand, of private companies to give an accurate return of the financial details of their business. Because of these conditions, it would seem that the time has come for the several states to extend their administrative machinery to a solution of this problem by requiring uniform reports from water, gas and electric light companies, whether under private or municipal ownership. It is safe to say that the work done by the Massachusetts Electric Light Commission in a given year will shed a stronger light of valid argument upon the relative merits of the two systems than will the report which we have under discussion.

Within these limitations, which are due essentially to the difficulty of the task, the work has been well done. That the investigation was not exhaustive nor the results conclusive is not to be charged against the compilers. The report has demonstrated the pressing need in the immediate future of uniform and accurate statistics of these public service industries to be collected under the supervision and control of our state governments. Not until this is brought about can we expect to have statistics upon which we can base valid conclusions as to the relative merits of private and municipal ownership of these industries.

University of Illinois. C. W. Tooke.

URBAN HOUSING.

Houses for the Working Classes: How to Provide them in Town and County. (Seven papers read at a national conference on the housing question at London.) London, P. S. King & Son, 1900. 12 mo, 48 pp.

The seven papers contained in this pamphlet were read and discussed at a national conference held at London on March 1, 1900, and participated in by about four hundred representatives from county and borough councils, vestries, urban and rural district councils, trade unions and other bodies interested in the housing question in England. The papers were as follows: "Bad Housing in Rural Districts," by Clement Edwards; "Laborers' Cottages," by Miss Constance Cochrane; "Facts as to Urban Overcrowding," by Dr. Edward Bowmaker; "The Existing Situation in London: Statistics of the Problem," by Mrs. R. C. Phillimore; "Power of Local Authorities," by Councilor W. Thompson; "Consideration of Practical Difficulties as Regards Building," by Councilor H. C. Lauder; "General Principles," by Councilor F. Lawson Dodd.

These papers were all prepared by persons who have had practical experience in dealing with the housing question either as private investigators or as public officials, and, taken together, they present a quite complete account of the actual housing conditions in England, both urban and rural, at the present time, with an exposition of the weak points of existing legislation, particularly the Housing of the Working Classes Act of 1890.

It is evident from these papers, that much needs to be done in the way of improved housing in England, notwithstanding the above mentioned act. Overcrowding still exists to an alarming extent, and where insanitary areas have been cleared under this act, a failure to properly accommodate the displaced tenants, has too often caused house famines, and compulsory improvements have been followed by higher rent rates, resulting in overcrowding and the creation of new slum districts in the places of those destroyed. Two of the papers deal with a subject not often discussed in this connection, namely, housing in the rural districts. It appears that in certain sections of England there is a sad need of proper housing accommodations among farm laborers, and of legislation for their protection as tenants.

As a result of this conference a national committee was formed for the purpose of watching a housing bill now before Parliament, and of impressing upon that body the absolute need for certain reforms. The conference also made, among others, the following suggestions, all of which are discussed in one or the other of the above mentioned papers: (1) that the local authorities be empowered to hold land outside their areas for future needs, and that they be empowered to acquire land compulsorily on the basis of assessable value and to hold the same for the purpose of providing better housing facilities; (2) that the rural district councils be empowered to acquire land cheaply and easily for building, without the sanction of any other body than the Local Government Board; (3) that the period of repayment of building loans be extended; (4) that grossly insanitary property be compulsorily acquired at the values of the materials and of the land, subject to the obligation to build thereon; (5) that in the case of rural tenants, a notice to quit of at least three months be made compulsory, etc., etc.

The pamphlet also contains a well arranged and well selected bibliography of the housing question in general, prepared by the Hon. Sidney Webb, L.C.C.

Washington, D. C. GUSTAVUS A. WEBER.

PUBLIC CONTROL OF CORPORATIONS.

Corporations and Public Welfare. Addresses at the Fourth Annual Meeting of the American Academy of Political and Social Science, April 19-20, 1900. Philadelphia, American Academy of Political and Social Science, 1900. 8vo, 208 pp. Paper, $1. New York, McClure, Phillips & Co. 12 mo. Cloth, $1.50.

This remarkable volume of addresses on the fundamental problem of political science in the present age is divided into four divisions, dealing with four phases of the general problem. These are "The Control of Public Service Corporations," "Influence of Corporations upon Political Life," "Combination of Capital as a Factor in Industrial Progress," and "The Future of Protection." The last two topics do not fall directly within the scope of MUNICIPAL AFFAIRS, and will therefore be little more than referred to in this review.

In his introductory address, Prof. L. S. Rowe, of Philadelphia, gives a careful analysis of the general principles involved in the relations between civic authorities and corporations performing specific public services. He gives a new expression to the idea that government exists for the people, not the people for government. This idea has peculiar significance when applied to municipal affairs, for the industrial and social city is always overflowing the boundaries of the municipal corporation. The city is, too, more than a district of congested residences—it is a flexus of wide-reaching social and economic interests. Indeed, certain semi-public enterprises, such as the electric street railway business and the distribution of water, once local *par excellence*, have recently expanded beyond city limits, and are beginning to require the attention of a wider political unit than the municipality.

In summarizing his address, Prof. Rowe says:

"An attempt has been made to show that the municipal public service industries must be considered in their relation to the industrial progress and social welfare of the community and that the relation between the municipality and the corporations performing these services must be adjusted with this end in view. Pecuniary return must be subordinated to quality and cost of service. Keeping both of these in view, it is evident that the old opposition to combination and monopoly in this class of services is out of harmony with the best interests of the community. Finally, the changes in the conditions of these industries themselves have threatened, and promise still further to

undermine the efficiency of municipal control. In the readjustment which must soon be made, municipal control must be subordinated to the larger interests of the state.

Comptroller Bird S. Coler, of New York, in his address, the second of this series, treats in a rather unsatisfactory way the problems of the financia control of public service corporations with particular reference to over-capitalization. The character of his reasoning is well illustrated by his discussion of the tax upon gross receipts. He thinks that this tax, if universally adopted, would enable the municipality to steer clear of the whole problem of capitalization, "excepting where a readjustment of percentages is deemed necessary, or municipal ownership of these corporations is proposed." The Comptroller is in line with scientific thought in the advocacy of uniformity and publicity of accounts for public service corporations.

The third address, by Prof. John H. Gray, of Northwestern University, gives a detailed and somewhat disheartening account of the efforts made by the city of Boston and the State of Massachusetts to control the companies which have supplied gas to the metropolitan district of New England. Thus far, it seems, the companies have been able to out-general the state commission with its statutory limitations. Says Prof. Gray:

"The very thing which has caused commission control to yield such meagre fruits in Massachusetts would be sure to make public ownership give still less desirable results. Has commission control been so complete a failure as to cause us to despair of the whole problem? This is too large a question to enter upon here. Suffice it to say that to despair here is to despair of all self-government as we understand that phrase. I venture the prediction, however, that if the problem is capable of solution, it must be settled along the lines of the work of the Massachusetts Gas Commission. For if my diagnosis of the evils to be eradicated and of the difficulties encountered by the commission is correct, it follows that the difficulty comes ultimately from the dependence of the commission upon the ignorance of the voter. It follows necessarily that the only possible remedy is the political, administrative, and industrial education of the voter and through him of the legislator."

In the next address, Dr. F. W. Speirs, of Philadelphia, discusses the street railway question. His financial conclusion is as follows:

"Our experience would seem to indicate that the ideal system of adjusting the relations of the municipality and street railway corporations, if we are to retain private management, is public ownership of tracks with private operation under a term contract for a period not exceeding twenty years. The contract should stipulate the lowest possible fare which promises a reasonable return on investment and should provide for a progressive tax on gross receipts."

In Dr. Speirs' opinion the prodigality of American cities in granting franchises has brought, along with its grave evils, certain large social benefits to be seen in the better equipment and more extended service of street railways in America than in Europe.

Senator William Lindsay, of Kentucky, whose address was upon the "Influence of Corporations on Political Life," after apologizing, in a way, for the part which corporations take in political affairs, makes this statement:

"I may say with reasonable confidence that nine-tenths of the corporations now engaged in shaping public opinion would welcome the opportunity to abandon that policy and gladly confine their attention and devote their moneys to none other than the purposes of their creation. If they could be relieved from the annoyances and dangers attending the attacks of the place-hunter and the professional agitator, and be protected against the demands of greedy party bosses in charge of party organizations,

they would submit without remonstrance to all proper restraints and forget their past political affiliations in the more energetic prosecution of their corporate business."

Yet the Senator admits that there are corporations which "first make themselves parties to combinations, having in view the control of particular lines of business, or the creation of monopoly, and then seek through political manipulations to protect themselves against the action of the legislatures and the judgments of the courts." In the following sentences the Senator strikes at the core of the problem:

"Whatever reduces or minimizes the importance of the individual diminishes the sense of responsibility and weakens the force of the obligations of duty that would otherwise impel every conscientious man to their due observance. So long as we unhesitatingly submit ourselves to the necessary tendency of this diminution of personal responsibility, we surrender our convictions of duty in politics to the policies and necessities of our party, and in organized business adventures, we surrender them to corporate interests and advantages. We look to dividends rather than to the approval of a good conscience, and hear with complacency, instead of resenting with indignation, the common witticism, that a corporation is a body without a soul."

Of the remaining addresses perhaps the most significant are the one by James B. Dill, Esq., of New York, on "Industrials as Investments for Small Capital," and the one by Hon. John Wanamaker, on "The Evolution of Mercantile Business," the latter being a defense of the department store. The addresses here reviewed do not tend to relieve one of anxiety for the future of free government. They point no easier way to success than the age-long process of strenuous effort and education through repeated failure.

Elk Rapids, Mich. DELOS F. WILCOX.

BRIEF NOTICES.

The Coming Democracy, by Orlando J. Smith (New York, The Brandur Co., 1900. 12mo, 162 pp. Cloth, $1.) is a stimulating, vivacious little work written by one who is a firm believer in democracy and who attributes such evils as at present exist to defects in governmental forms rather than the democratic theory of government. The author argues in a convincing way for a simpler governmental organization, a more direct and immediate relationship between people and officials, fewer instances of indirect election, shorter terms of office, direct nomination, proportional representation and municipal home rule. Those who do not agree with the conclusions reached may criticise the work because of the constant comparison of municipal with private corporations, and the tendency to use analogy where there is little similarity.

Of a similar character is *The Machine Abolished and Restored to Power*, by Dr. Charles C. P. Clark (New York, Putnam's Sons, 1900. 12mo, 196 pp. Cloth, $1.) This work, in substance, was printed several years ago but did not receive the attention it deserved, except in a small circle. Fortunately for those interested in municipal problems, it is now available to all. Dr. Clark's plan, which is based upon the idea that the existence of the machine is due to an imperfect election system, involves the formation of small primary assemblies in which the voter may become acquainted with the man he votes for, with the duties which the candidate, if elected, will discharge and with his ability to do so. Doubtless Dr. Clark has in mind the excellent results of the old town meeting system in New England but does not appreciate to the full extent the great difference between the present city and the old New England town, and the difficulties such a scheme would encounter. The book is well worth careful reading. It states in a pleasing and striking way many suggestive ideas.

The Engineering Record has added another useful work to its list of valuable publications. *Water Works for Small Cities and Towns*, by John Goodell (New York, Engineering Record, 1899. 8vo., 286 pp. Cloth, $2), is replete with information never before collected into such an available volume, and will be found of great use to water-works officials in villages and small cities. Many others will also find it well worth perusal.

Municipal Improvements; A Manual for the Municipal Official, by W. F. Goodhue (3rd edition. New York, Wiley & Sons, 1900. 12 mo, 207 pp. Cloth, $1.25), is another useful volume, which aims to cover the whole ground of municipal engineering. It does not enter into great detail, the object being to present the most important facts in a very brief and general way so that the average person unacquainted with technical details can learn something of engineering matters without being an engineer.

Similar in character are two recent works upon sewage disposal: *The Purification of Sewage*, by Sidney Barwise (New York, Van Nostrand Co., 1899. 12 mo, 150 pp. Cloth), and *The Separate System of Sewerage*, by Cady Staley and George S. Pierson (New York, Van Nostrand Co., 1899. 8 vo, 324 pp. Cloth, $3.) The former of these two works is more general in character and does not go so fully into detail as the latter, but deals chiefly with the chemical and biological principles involved, being the results of experience gained as medical officer of health in Derbyshire, Eng. The work by President Staley and Mr. Pierson is much more complete, although it does not attempt to cover the whole field. Its object is to explain the "separate system," to give practical directions for designing and constructing sewers in accordance with that system, and to show what results have been secured wherever it has been tried. The work is now passing through its third edition which indicates the warm reception accorded to it and its recognized value.

Street Pavements and Paving Materials, by George W. Tillson (New York, Wiley & Sons, 1900. 8 vo, 532 pp. Cloth, $4.) We feel perfectly confident in recommending this work to the student, the engineer and the city official, as it is a comprehensive and well executed attempt to show the various methods of solving street paving problems, and to point out how the best results can be obtained. The book is, of course, largely technical in character and primarily designed for city officials and those who have to deal with the technical problems. But its usefulness is by no means confined to this class.

The Law of Electric Wires in Streets and Highways, by Edward Quinton Keasbey (Chicago, Callaghan & Co., 1900. 8 vo, 358 pp.), is, as the title indicates, a purely legal work and one that has met a well felt want. It is now in its second edition. The author goes very thoroughly into court decisions and legal enactments. The chapters of greatest interest to general readers are those upon "Franchises—Legislative and Municipal" and "Municipal Control." Excellent legal works upon this subject are very scarce and the one before us deserves warm recommendation.

BIBLIOGRAPHICAL INDEX.

KEY TO ABBREVIATIONS.

BRITISH AND AMERICAN PERIODICALS.

American Architect, Boston	W	Am. Arch.
American Ecclesiastical Review, New York	M	Am. Ecc. R.
American Economic Association Publications, New York	B-M	Am. Econ. Assoc.
American Electrician, New York	M	Am. Elec.
American Federationist, Washington	M	Am. Fed.
American Gas Light Journal, New York	W	Am. Gas Light J.
American Historical Review, New York	Q	Am. Hist. R.
American Journal of Science, New Haven	Y	Am. J. Sci.
American Journal of Sociology, Chicago	Q	Am. J. Sociol.
American Law Review, St. Louis, Mo	M	Am. Law R.
American Monthly Review of Reviews, New York	M	Am. R. of Rs.
American Public Health Association, Concord, N. H	Q	Am. P. H. Assoc.
American Statistical Association Publications Boston	Q	Am. Statis. Assoc.
Annals of the American Academy of Political and Social Science, Philadelphia	B-M	Ann. Am. Acad. Pol. Sci.
Architect, London	W	Arch.
Architectural Record, New York	Q	Arch. Rec.
Architectural Review, Boston	S-Q	Arch R.
Architecture and Building, New York	W	Arch. & Buil.
Arena, Boston	M	Arena.
Atlantic Monthly, Boston	M	Atlan.
Banker's Magazine, London	M	Bank. M. (L.)
Banker's Magazine, New York	M	Bank. M. (N. Y.)
Bibliotheca Sacra, Oberlin, O	Q	Bib. Sacra.
Blackwood's Magazine, Edinburgh	M	Blackw.
Board of Trade Journal, London	M	Bd. Trade J.
British Architect, London	W	Br. Arch.
Builder, London	W	Builder.
Bulletin of the Department of Labor, Washington	B-M	B. Dept. Labor.
Canadian Architect, Toronto	M	Can. Arch.
Canadian Electrical News, Toronto	M	Can. Elec. N.
Canadian Engineer, Montreal	M	Can. Eng.
Canadian Magazine, Toronto	M	Canadian M.
Cassell's Family Magazine, London	M	Cassell's.
Cassier's Magazine, New York	M	Cassier's.
Century, New York	M	Cent.
Chamber's Journal, Edinburgh	M	Chamber's.
Charities Review, New York	M	Char. R.
Charity Organization Review, London	M	Char. Or. R.
Chautauquan, Cleveland, O	M	Chaut.
City and State, Philadelphia	W	City & State.
City Record, Boston	W	City Rec.
Commons, The, Chicago	M	Commons.
Commonwealth, New York	W	Commonw.
Consular Reports, Washington	M	Cons. Rep.
Contemporary Review, London	M	Contemp.
Cornhill Magazine, London	M	Cornhill.
Cosmopolitan, New York	M	Cosmopol.
Dial, Chicago	S-W	Dial.
Direct Legislation Record, Newark, N. J	M	Dir. Leg. Rec.
Dublin Review, London	Q	Dub. R.
Eclectic Magazine, New York	M	Ecl. M.
Economic Journal, London	Q	Econ. J.
Economic Review, London	M	Econ. R.
Economist, Chicago	W	Economist.
Edinburgh Review, Edinburgh	Q	Ed. R.
Education, Boston	M	Educa.
Educational Review, London	M	Educa. R. (London.)
Educational Review, New York	M	Educa. R. (N. Y.)
Electrical Engineer, London	W	Elec. Eng. (L.)
Electrical Engineering, Chicago	M	Elec. Engng.
Electrical Review, New York	W	Elec. R.
Electrical World and Electrical Engineer, New York	W	Elec. W. & E.
Electrician, London	W	Elec'n.
Electricity, London	W	Elec'y (L.)
Engineer, The, London	W	Eng.

Engineering, London	W	Engng.
Engineering Magazine, New York	M	Engng. M.
Engineering News, New York	W	Engng. N.
Engineering Record, New York	W	Engng. Rec.
English Historical Review, London	Q	Eng. Hist. R.
Fire and Water, New York	W	Fire & W.
Fortnightly Review, London	M	Forta.
Forum, New York	M	Forum.
Gas World, London	W	Gas W.
Green Bag, Boston	M	Green B.
Gunton's Magazine, New York	M	Gunton's.
Harper's Magazine, New York	M	Harper's M.
Harper's Weekly, New York	W	Hrprs. Wkly.
Illinois Society of Engineers and Surveyors, Peoria		Ill. Soc. Eng.
Independent, New York	M	Ind.
Indian and Eastern Engineer, Calcutta	W	Ind. & East. Eng.
Indian Engineering, Calcutta	W	Ind. Engng.
International Review, New York	M	Internat. R.
Johns Hopkins University Studies in History, etc., Baltimore		J. H. Univ. Studies.
Journal of the Association of Engineering Societies, Philadelphia	M	J. Assoc. Engng. Soc.
Journal of the Department of Labor, Wellington, New Zealand	M	J. Dept. Labor.
Journal of Finance, London	M	J. Finance.
Journal of the Franklin Institute, Philadelphia	M	J. Frankl. Inst.
Journal of Gas Lighting, London	W	J. Gas Light.
Journal of the New England Water-Works Ass'n, New London, Conn.	Q	J. N. E. W. W. Assoc.
Journal of Political Economy, Chicago	Q	J. P. E.
Journal of the Royal Statistical Society, London	Q	J. R. Stat. Soc.
Journal of the Sanitary Institute	M	J. San. Inst.
Journal of Social Science, Boston	Y	J. Soc. Sci.
Journal of the Society of Arts, London	W	J. Soc. Arts.
Journal of the Society of Comparative Legislation, London	Q	J. Soc. Comp. Leg.
Journal of the Western Society of Engineers, Chicago	B-M	J. W. Soc. Eng.
Kindergarten Magazine, Chicago	M	Kindergarten M.
Labor Bulletin of the Commonwealth of Massachusetts, Boston	Q	Labor Bulletin, Mass.
Law Magazine and Review, London	M	Law M. & R.
Leslie's Weekly, New York	W	Leslie's Wkly.
Library Journal, New York	M	Lib. J.
Lippincott's Magazine, Philadelphia	M	Lippinc.
Literary Digest, New York	W	Lit. Dig.
Longman's Magazine, London	M	Longm.
Macmillan's Magazine, London	M	Macmil.
McClure's Magazine, New York	M	McClure's.
Merchant's Association Review, San Francisco, Cal.	M	Mchts. Assoc. R.
Municipal Engineering, Indianapolis, Indiana	M	Mun. Engng.
Municipal Journal and Engineer, New York	M	Mun. J. & Eng.
Municipal Journal and London, London	W	Mun. J. & London.
Municipal and Railway Record, New York	M	Mun. & Ry. Rec.
Municipal World, St. Thomas, Ont.	M	Mun. World.
Munsey's Magazine, New York	M	Munsey's.
Nation, New York	W	Nation.
National Review, London	M	National R.
New Century Review, London	M	New Cent. R.
New England Magazine, Boston	M	New Eng. M.
New Review, London	M	New R.
New York Education, Albany	M	N. Y. Educa.
Nineteenth Century, London	M	19th Cent.
North American Review, New York	M	No. Am.
Open Church, New York	Q	Open Church.
Open Court, Chicago	M	Open Court.
Our Country, New York	M	Our Country.
Our Day, Boston	M	Our Day.
Outlook, New York	W	Outlook.
Overland Monthly, San Francisco, Cal.	M	Overland.
Park and Cemetery, Chicago	W	Park & Cem.
Political Science Quarterly, New York	Q	Pol. Sci. Q.
Popular Science Monthly, New York	M	Pop. Sci. Mo.
Proceedings of the Engineers' Club, Philadelphia	Q	Pro. Eng. C.
Progressive Age, New York	W	Prog. Age.
Public Opinion, New York	W	Pub. Opin.
Publications of the Southern Historical Association, Washington		Pub. So. Hist. Ass'n.
Quarterly Journal of Economics, Cambridge, Mass.	Q	Q. J. E.
Quarterly Review, London	Q	Quar. R.
Railroad Gazette, New York	W	Railroad Gaz.
Railway World, London	M	Ry. World.
Real Estate Record and Guide, New York	W	Real Estate Rec. & G.
Review of Reviews, London	M	R. of Rs. (Eng.)
Sanitarian, Brooklyn	M	Sanitarian.
Sanitary Journal, Glasgow	M	San. J.
Sanitary Record, London	W	San. Rec.
Saturday Review, London	W	Sat. R.
Scientific American, New York	W	Sci. Am.
Scientific American Supplement, New York	W	Sci. Am Sup.
Scottish Review, London	Q	Scottish R.

Scribner's Magazine, New York	M	Scribner's.
Self-Culture, Akron, Ohio	M	Self-Cult.
Spectator, London	W	Spec.
Strand Magazine, London	M	Strand.
Street Railway Journal, New York	M	St. Ry. J.
Street Railway Review, Chicago	M	St. Ry. R.
Transactions of the American Institute of Electrical Engineers, New York	M	Trans. Am. Inst. Elec. Eng.
Transactions of the American Society of Civil Engineers, New York	M	Trans. Am. Soc. Civ. Engrs.
Westminster Review London	M	Westm.
Yale Review, New Haven, Conn	Q	Yale R.

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Allgemeines Statistisches Archiv, Tübingen	S-Y	All. Stat. Ar.
Annales D'Hygiene Publique, Paris	M	Ann. D'Hyg. Pub.
Annales des Sciences Politiques, Paris	M	Ann. Sci. Pol.
Annales des Travaux Publics de Belgique, Brussels	Bi-M	Ann. Travaux Pub.
Arbeiterfreund, Berlin	Q	Arbeit.
Archiv für Eisenbahnwesen, Berlin	B-M	Ar. Eisenbahn.
Archiv für Oeffentliches Recht, Freiberg	Q	Ar. Oef Rt.
Archiv für Soziale Gesetzgebung und Statistik, Berlin	B-M	Ar. Soz. Gesetz. Stat.
Bibliotheque Universelle, Brussels	M	Bib. Univ.
Deutsche Bauzeitung, Berlin	B-W	Deut. Bau.
Deutsche Revue, Stuttgart	M	Deut. R.
Deutsche Rundschau, Berlin	M	Deut. Rund.
Devenir Social, Paris	M	Dev. Soc.
Elektrotechnische Zeitschrift, Berlin	M	Elek Zeit.
Espana Moderna, Madrid	M	Esp. Mod.
Finanz-Archiv, Stuttgart	S-Y	Finanz-Ar.
Génie Civil, Paris	W	Génie Civil.
Gesundheits-Ingenieur, Munich	B-W	Gesund.-Ing.
Giornale Degli Economisti, Roma	M	G Degli Econ.
Historische Vierteljahrschrift, Leipzig	Q	Hist. Vier.
Historische Zeitschrift, Munich and Leipzig	Q	Hist. Zeit.
Historisches Jahrbuch, Munich	Q	Hist. Jr.
Jahrbuch für Gesetzgebung Verwaltung und Volkswirtschaft in Deutschen Reich, Leipzig	Q	Jr. Gesets. Ver. Volks.
Jahrbücher für Nationalokonomie und Statistik, Jena	Q	Jr. Nat. Stat.
Journal des Économistes, Paris	M	J. Economistes.
Nouvelle Revue, Paris	S-M	Nouvelle R.
Nouvelle Revue Historique, Paris	B-M	N. R. Hist.
Nuova Antologia, Rome	S-M	Nuova Ant.
Preussische Jahrbücher, Berlin	M	Preus Jr.
Reforma Sociale, Turin	M	Reforma Soc.
Réforme Sociale, Paris	M	Ref Soc.
Revue Bleue, Paris	W	R. Bleue.
Revue de Deux Mondes, Paris	S-M	R. Mondes.
Revue de Droit Publique, Paris	B-M	R. Droit Pub.
Revue D'Économie Politique, Paris	M	R. Econ. Pol.
Revue Generale, Brussels	M	R. Gen.
Revue Internationale de Sociologie, Paris	M	R. Int. Sociol.
Revue de Paris, Paris	S-M	R. Paris.
Revue Pédagogique, Paris	M	R. Ped.
Revue Pénitentiaire, Paris	B-M	R. Pen.
Revue Politique et Parliamentaire, Paris	M	R. Pol. e. Par.
Revue des Questions Historiques, Paris	M	R. Ques. Hist.
Revue des Questions Scientifiques, Brussels	W	R. Ques. Sci.
Revue des Revues, Paris	S-M	R. Revs.
Revue Scientifique, Paris	W	R. Sci.
Revue Socialiste, Paris	M	R. Soc.
Revue Technique, Paris	B-W	R. Technique
Revue du Travail, Brussels	M	R. Travail.
Rivista Internacional, Madrid	M	Riv. Inter.
Rivista D'Italia, Roma	M	Riv. D'It.
Rivista Italiana di Sociologia, Roma	B-M	Riv. It. Sociol.
Schweizerische Bauzeitung, Zürich	W	Schweiz. Ban.
Scienza Sociale, Milan	B-M	Sci. Soc.
Staats-und Socialwissenschaftliche Forschungen, Leipzig	Q	Staats-Soc. Forschungen.
Staats-und Völkerrechtliche Abhandlungen, Leipzig	Q	Staats-Völk. Abhand.
Statistik Tidskrift, Stockholm	Q	Stat. Tid.
Vierteljahrschrift für Staats-und Volkswirtschaft, Leipzig	Q	Vier. Staats. Volks.
Zeitschrift für die Gesamte Staatswissenschaft, Tübingen	Q	Zeit. Staatswissen.
Zeitschrift für Oesterreichischen Ingenieur-und Architekten-Vereines, Vienna	W	Zeit. Ing.-Arch-Ver.
Zeitschrift für Social und Wirthschaftsgeschichte, Weimar	Q	Zeit. Soc Wirth.
Zeitschrift für Socialwissenschaft, Berlin	M	Zeit. Socialwissen.
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Zeitschrift für Volkswirtschaft, Socialpolitik und Verwaltung, Vienna	Q	Zeit. Volks. Soc. u. Ver.

INDEX FOR THE QUARTER, JUNE—SEPTEMBER, 1900.

(NOTE.—The following subject index is intended to continue the work began in the first (March, 1897) issue of MUNICIPAL AFFAIRS, which was entirely devoted to a Bibliography of Municipal Administration and City Conditions. In subsequent numbers, the Index was made complete to June 1st. So far as possible all books, reports, pamphlets and magazine articles of interest to students of city government which have appeared during the past three months, June to September, 1900, are included in the following list. Future numbers of MUNICIPAL AFFAIRS will contain similar indices covering the literature of each preceding quarter.)

Abattoirs, Public.

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Baths, Lavatories and Wash-Houses, Public.

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BIOGRAPHICAL NOTICES

OF THE

WRITERS IN MUNICIPAL AFFAIRS FOR SEPTEMBER, 1900.

PERCY W. L. ASHLEY.—Formerly scholar of Lincoln College, Oxford; Russell research student of the London School of Economics, 1898–1900; and now lecturer there.

M. N. BAKER.—Born in Enosburgh, Vermont. Took civil engineering course in the University of Vermont and graduated in 1886. Has been associate editor of "Engineering News" (New York) and editor of *The Manual of American Water-Works* since 1887. Has written several books on sewerage and sewage purification, the section on *Water-Works* for "Municipal Monopolies," the articles on *Municipal Engineering* for the "International Year Book," and many papers on municipal engineering, economics and government. Has been connected with the local government of Montclair, N. J., for a number of years. Is chairman of the executive council of the New Jersey Sanitary Association, of several committees on uniform municipal accounts and reports, and practices as consulting municipal engineer.

JAMES R. CARRET.—Born February 16, 1845, near Trinidad, Cuba, of American parents, his father being in business there. In the spring of 1850 returned to the United States, and has since lived in or near Boston. Was graduated from Harvard University in 1867; then studied law and was admitted to the bar in 1871. From 1873 to 1879 was one of the assistant city solicitors of Boston, having charge of the work of examining titles in connection with land damage claims against the city and the purchase of lands for public purposes. Since leaving the employ of the city, has been chiefly engaged in conveyancing. In 1894 was appointed by Governor Russell as a member of the commission to draft a bill for the introduction into Massachusetts of the Torrens system of land transfer.

JAMES BLAKE CAHOON.—Was graduated from the United States Naval Academy in 1879, and served in the Navy until 1889, when he retired owing to a serious injury to his eye sight while conducting searchlight experiments. Until 1895 was connected with the Thomson-Houston Electric Company and the General Electric Company into which the former was merged. For four years was general manager of the electric-light, gas, water and street railway companies of Elmira, which were, under his management, completely reorganized and made paying properties. At present is a consulting engineer and vice-president of the Oneida Light and Power Company. Has recently been elected president of the National Electric Light Association.

MILO ROY MALTBIE.—Born near Hinckley, Illinois. Received his early education in the public schools and the preparatory department of Upper Iowa University, graduating from the College in 1892. Spent one year in the graduate school of the Northwestern University, devoting particular attention to municipal government. Was awarded, in 1893, the Dewey prize of $100 in Political and Social Science, and the Cushing prize of $100 in Municipal Government for a dissertation upon *The City*

Government of Chicago. From 1893 to 1895 taught higher mathematics and economics in Mount Morris College, Illinois, leaving there to accept the university fellowship in administrative law at Columbia University. Received the degree of Ph. D. from the latter institution in 1897, having given particular attention to administrative law, public law, economics and municipal government. After graduation, was chosen secretary of the Reform Club Committee on Municipal Administration and editor of MUNICIPAL AFFAIRS. Spent the summer of 1899 studying municipal problems and conditions in Europe. Prize lecturer upon municipal government in Columbia University, 1900. Has written *English Local Government of To-day; Central Administrative Control in England; The English Local Government Board; Municipal Functions; A Study of the Development, Scope and Tendency of Municipal Socialism;* and several papers upon other municipal subjects appearing in various magazines.

EDMUND JANES JAMES.—Was born May 21, 1855, in Jacksonville, Illinois. Educated at the Illinois State Normal School, Northwestern and Harvard universities, receiving the degree of doctor of philosophy from the University of Halle in 1877. Was professor of public finance and administration at the University of Pennsylvania from 1888 to 1896, accepting a call to the University of Chicago in February of that year. Has been president of the American Academy of Political and Social Science since 1889, and is a member of many prominent associations in the United States and Europe.

RICCARDO BACHI.—Born in Turin, Italy, 1875. Attended the Technical Institute of Turin and in 1896 the Royal High School of Commerce of Venice, receiving the degree of professor of accountancy in 1896. The following year became fellow of the *Laboratorio di Economia Politica* of Turin under the direction of Professor S. Coquetti de Martiis. Was appointed in 1896 professor of accountancy in the Royal Technical School of Arcevia and later in the Municipal Technical Institute and the Royal Technical School of Vicenza. Has written several pamphlets upon accountancy and municipal subjects, contributing to "Reforma Sociale," "Revista de Legislacion y Jurisprudencia," "Ragioniere" and "Rivista di Amministrazione e Constabilita."

JOHN ARCHIBALD FAIRLIE.—Born in Glasgow, Scotland, 1872. Attended public schools in Scotland and Jacksonville, Florida. Entered Harvard College in 1891, and received the degree of A. B. in 1895. Had specialized during his undergraduate course in history, government and economics, and continued these subjects in the graduate school of Harvard University for two years. In 1896, received the degree of A. M., and during 1896–7, was assistant in English History at Harvard. Was university fellow in political science at Columbia University in 1897–8, and received the degree of Ph. D. from that institution in 1898. Has since been secretary of committee on canals of New York State, 1899; lecturer on Municipal Administration, Columbia University, 1899–1900; and assistant professor of Administrative Law, Michigan University, 1900. Has published: *The Economic Effects of Ship Canals; The Centralization of Administration in New York State; Comparative Municipal Statistics,* Quarterly Journal of Economics, February, 1900; Statistical tables and data relating to the canals and commerce of New York in Report of Committee on Canals; *The New York Canal,* Q. J. E. February, 1900; *State Administration in New York,* P. S. Q., March, 1900; *Municipal Development in the United States* in a Municipal Program.

MUNICIPAL AFFAIRS.

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EDITORIAL.

Greater New York, from a municipal point of view, outranks all other cities of the world when the magnitude of its undertakings are considered. Second only to London in population, it has as many inhabitants as the thirteen original colonies when they won their independence. Its area is 308 square miles, not including water areas, whereas London (the London governed by the County Council) embraces only 118 square miles; Paris about 30; and Berlin 25. Thus within the boundaries of Greater New York, one could place London, Paris, Berlin, Rome, Vienna—in fact nearly all the European capitals.

New York's budget, containing appropriations in 1901 of almost $100,000,000, is several times greater than that of any state in the United States, including New York state, and is about one-fifth or one-sixth of the expenditures of the national government, although the population of the United States is twenty times that of New York City. Even London, with a population of nearly 5,000,000—40 per cent more than New York—spends only seven-tenths as much, or some $30,000,000 less. Paris falls slightly short of London, and Berlin manages to get on with very much less than New York or Paris.

Although municipal activities have not been carried so far in the United States as in Germany or Great Britain, the American metropolis has a large range of duties to perform. Its water works are the largest in the world, and the subway will be unequalled. Its docks, markets and ferry franchises yield large

revenues; and unparalelled sums are spent every year upon charitable institutions, hospitals, schools, fire departments, parks, street paving, street cleaning, garbage disposal and the police. Of less importance, but only comparatively, are the municipal lodging house, nautical school, City College, Normal School, the public baths, recreation piers, open air concerts, etc., etc.

But the city means still more, for its powers are very broad and it determines to a very large extent the welfare of its citizens both by the enactment of just or unjust laws and their enforcement or non-enforcement.

Conditions in New York are of importance, first, to the citizens of New York, and, secondly, to the citizens of other cities. At the present moment, a stock-taking is especially apropos, for a municipal election will be held within the next few months and officials chosen for four years. The symposium which appears in this number has been prepared not merely to show how efficiently or inefficiently certain of the principal departments are managed, but rather to increase the sum total of positive fact as to which there can be no question, to suggest some of the problems which are pressing for solution, and to consider the methods through which this has been attempted. In future issues this symposium will be continued and other lines of activity dealt with.

THE SINKING FUNDS OF THE CITY OF NEW YORK.

By Edgar J. Levey.

The Sinking Fund system of the City of New York has long been shunned by the casual student of municipal affairs on account of its intricacies and difficulties, which have, indeed, sometimes been exaggerated. That this system is far from simple cannot be denied; but it is by no means true that its complexities are so great as to offer serious obstacles to the understanding of any intelligent investigator. Even in its most defective features, it is a natural outgrowth from the financial conditions of the past century, and a brief narrative of those conditions will serve to explain the existence of many peculiarities which might otherwise seem anomalous.

Before taking up for review the history of the New York city sinking funds, it is desirable, however, to appreciate at the outset the difference between the conditions under which sinking funds are established by national and by municipal governments. National governments are supported largely, if not chiefly, by indirect taxation and by revenues uncertain in amount, in consequence of which there can be no exact or scientific correspondence between budgetary appropriations and treasury receipts. Their budgets may fall within the limits of these revenues or they may exceed them. In the one event, there is a treasury surplus; in the other, a deficit. If the maintenance of a sinking fund be not treated as a preferred obligation over other items in a national budget, the moneys which should be applied to it are usually the first to be diverted to the more pressing exigencies of current expenditure, and its growth is continually interrupted. If, on the other hand, the maintenance of a sinking fund be treated as a preferred obligation, it will necessarily happen, in years of deficient revenue, that the nation must become otherwise indebted, partly or wholly as a result of such sinking fund maintenance. In other words, faithful redemption of old debt merely results, under such conditions, in the incurring of new debt, and sometimes at a higher rate of interest. This is precisely what happened to England during the

period of heavy borrowing between 1785 and 1829, when about £330,000,000 were borrowed at about five per cent in order to redeem the same amount of debt at four and one-half per cent, resulting in an annual interest loss of £1,627,765 for 43 years.

The frequent changes of policy in regard to the maintenance of sinking funds by both the governments of Great Britain and the United States have been attributable, principally, to these causes.

In the municipal governments of to-day, however, the raising of annual revenue follows as a direct consequence of the framing of the annual budget, and the extent of that revenue is made dependent, with almost scientific exactness, upon the size of each budget. In American municipalities direct taxation, if not the sole means of revenue, is at least the residual factor, determined (through the medium of a tax rate) by the requirements of the annual appropriations. There should be, therefore, neither surplus nor deficiency, and the causes which, in national governments, give rise to temporary suspensions of debt amortization and disarrangement of sinking fund policies are wholly absent. There are, in contemporary municipal governments, no obstacles in the way of scientific debt redemption, unless those obstacles be—as they are in the case of New York city—inherited from the mistakes of the past.

THE SINKING FUND OF 1813.

It is not difficult to understand why the sinking fund of the city of New York was originally framed upon defective principles. The funded debt of the city had its beginning in 1812, when authority was obtained from the legislature to issue bonds to the amount of $900,000 to fund floating indebtedness which had been incurred by the city partly on account of the construction of the present city hall and other public buildings. The act of the legislature of June 8, 1812, did not attempt to pledge any specific revenues of the city for the *redemption* of the bonds thereby authorized to be issued, but sweepingly declared that "all and singular, the revenues of the Mayor, Aldermen and Commonalty shall be and they are hereby pledged and appropriated for the payment of the *interest* which shall become due on the said stock."

In 1813 Comptroller Thomas R. Mercein took steps looking towards the ultimate redemption of the principal of this debt and recommended to the common council the establishment of a sinking fund for this purpose. At that time expenditures of the city

government were not strictly limited, as now, by appropriations made in advance of the incurring of liability. Public work was performed and supplies were furnished upon the orders of the common council; and, while the local authorities were compelled to furnish to the legislature estimates of expense in order to obtain annual authority to levy taxes, there was no substantial correspondence between these estimates and the liabilities actually incurred from time to time by the common council. Moreover, in the early part of the nineteenth century, the miscellaneous revenues of the city formed a much larger proportion than now of the total receipts of the city treasury, and to this extent taxation was a less important factor in determining the limits of annual expenditure. There were at that time frequent annual deficits, and the whole financial system bore more resemblance to the state of the national finances than it did to the better ordered budgetary methods of modern municipalities.

When Comptroller Mercein first broached the idea of a municipal sinking fund for the city of New York, the ideas of the preceding century in regard to what constituted "funded" debt still persisted to a considerable degree. Debt was regarded as "funded" when based upon the pledge or mortgage of specific revenues. The state of the public credit then was not unlike that of China to-day, in that creditors demanded a tangible or visible guarantee. As Professor Ross states of the early English loans: "By this 'funding' policy the public debt came to consist of many small loans, each bottomed on its own petty item of revenue. This complicated and rigid system, wherein the growth of one source of income could not be used to eke out the shrinkage of another, proved unfit for a growing public finance."[1] It will be noted hereafter how a somewhat similar system has proved equally unfit for the growing public finance of the city of New York.

Comptroller Mercein had before him the examples of the United States and British governments, which had established sinking funds based upon pledges of specific revenues. Perhaps he may also have been influenced by the fact that it was doubtless easier then, as it is now, to secure for any purpose the appropriation of miscellaneous revenues of the city than moneys raised directly by taxation. Mercein's scheme contemplated the pledging

[1] *Sinking Funds*, p. 9.

of commutation of certain water lot rents and quit rents; licenses for pawnbrokers, second-hand dealers, hackney coaches and street vaults; market rents and fees and twenty-five per cent of the proceeds of sales of real estate belonging to the corporation (afterwards changed to all the proceeds of the sale of real estate belonging to the corporation in 1825). He estimated that these revenues would provide the sum of $400,000 by January 1, 1827, when the city stock became payable, leaving $300,000 to be otherwise provided for. On August 9, 1813, an ordinance in substantial conformity with his recommendations was passed.[1] The preamble of this ordinance read "whereas, it is highly useful to establish a fund out of which purchases of the New York city stock may from time to time be made, whenever the same can be done at par or the true value thereof, whereby the said stock will be prevented from depreciating and the redemption of the same will be regularly progressing, therefore," etc., etc.

The history of this sinking fund from 1813 to the date of its re-organization by the sinking fund ordinance of February 22, 1844, does not call for particular description, except that attention may be called to the financial inconvenience experienced from time to time by reason of the accumulation of unnecessarily large annual revenues, which fluctuated between $10,146.80 in 1814 and $176,556.55 in 1843.

Although the legislature, by several enactments following the Act of 1812, had made the sinking fund provisions of the ordinance of 1813 applicable to loans issued under their provisions, on December 10, 1832, the comptroller, Mr. Talman J. Waters, called the attention of the common council to the fact that the cash accumulations of the fund amounted to $311,101.49; that the outstanding city stock could not readily be obtained for purchase, as shown by the fact that "since the 15th July, 1831, there have been but three transfers of that stock, and they not for sale but for apportionment of estates"; and asked the question: "What shall be done with the accumulations of the sinking fund account?" He

[1] Reënacted with slight variations in the revisions of 1817, 1821, 1823, 1827 and 1834. The commissioners named were the mayor, recorder, city treasurer (chamberlain), comptroller, and chairman of the finance committee of the board of aldermen. Until the passage of the Greater New York charter in 1897, when the president of the council was substituted for the recorder, no change was made in the composition of this body, except that during the existence of bicameral local legislatures, the chairmen of the finance committees of both houses were commissioners of the sinking fund, *ex officio*.

called attention to the fact that, exclusive of sales of real estate, the average revenue of the fund would be sufficient to redeem the outstanding bonds in less than seven years, though those bonds had seventeen years to run, and he recommended that $300,000 of the sinking fund's cash be applied to the payment of bonds of the corporation (not by the terms of their issue redeemable from the sinking fund) held by the Bank for Savings.[1] This recommendation (entirely justifiable by the financial condition of the sinking fund, but as objectionable, from a technical standpoint, as many suggestions destined to be made thereafter in regard to similar conditions) was reported on favorably by the finance committee of the common council, who entered into an extended argumentative defense of the proposition.

The committee was of the opinion that "the case under consideration is one of a different character from that which would exist if the corporation were to pay its current engagements as they are contracted from year to year out of the sinking fund. That would clearly be a violation of the intention and purpose of the act, inasmuch as it would put in jeopardy that sacred and ample security which the legislature has reserved for the public creditor." This virtuous declaration was not accompanied by reference to the fact that the bonds proposed to be redeemed had been originally issued for current expenses and intended to be merely temporary loans to be paid from the proceeds of taxes, which had not been forthcoming.

This early difficulty, which was followed by numerous other advances of the surplus revenues of the sinking fund for general treasury purposes, foreshadowed many later experiences in the management of the sinking fund; among them, (1) that the revenues of municipal sinking funds can with difficulty be used to purchase before maturity bonds held by the public; (2) that one of their most useful functions is in absorbing new funded debt as it is issued from time to time; and (3) that sinking funds based on pledges of specific revenue lead to the greatest financial inconveniences without any corresponding advantages.

In 1834 the comptroller again called attention to the impracticability of making investments as directed by the ordinance, in consequence of the very high prices maintained by the several stocks therein designated, and renewed a former suggestion that,

[1] *Documents Bd. of Ald.*, Vol. II, No. 60.

inasmuch as a judicious investment of the funds could not be made in conformity with the ordinance, they might be applied to the payment for such real estate as the common council might deem it necessary to purchase for public purposes.[1]

On March 4, 1834, an ordinance was adopted (subsequently followed by many of a similar character) authorizing the commissioners of the sinking fund to invest in the purchase of lands for the extension of Grand street, Essex and Centre markets, providing at the same time that "the whole of the rents, fees and income of said markets in their improved state, and the land thus purchased, are hereby appropriated and pledged for payment of the principal and interest of the sum that shall be thus drawn from the said fund."[2]

These occasional diversions of the fund did not appear, however, to confine its growth within the limits of its original purpose. On January 1, 1840, the total funded liabilities of the city amounted to $7,716,105.78, of which $5,473,730 consisted of water stock, with he redemption of which the sinking fund had been charged on May 7, 1835. In his report for the year 1839, Comptroller Alfred A. Smith called attention to the fact that the revenues of the sinking fund "assigned originally to pay off a debt of a few hundred thousand dollars, not yet due by ten years, are amply sufficient to extinguish the whole funded liabilities of the city as they mature, with the exception of about two millions of the water loan redeemable in 1860; and this, too, without impairing its present capital or resorting to the claim for money heretofore drawn from the sinking fund for general treasury purposes, and which should be returned to it." He called attention, however, to the fact that the cost of the Croton Aqueduct would largely exceed the original estimates; that large additional issues of the stock would therefore have to be made; stated, that the revenue from the sale of water for years to come could not be expected to "contribute much, if, indeed, any, more than sufficient to keep down the interest of its cost"; doubted, in fact, "whether it can ever furnish anything towards the final cancellation of the loan!" and finally recommended that the sinking fund be strengthened by adding excise and ferry licenses to its pledged revenues.

[1] *Compt. Rep.*, 1834, p. 4.

[2] *Proceedings, Common Council*, Vol. II, p. 184.

CAUSES WHICH LED TO THE SINKING FUND ORDINANCE OF 1844.

On January 1, 1843, the city debt had grown to $14,790,424.33, of which $11,897,801.10 had been incurred for the new Croton water system. The proper method of paying the interest on this water stock became a subject of political discussion. Pending the construction of the Croton Aqueduct, the interest on these bonds had been paid largely out of the proceeds of new issues; but during the last five months of 1842, such interest, to the amount of $152,914.53, had been paid from taxation. In that year the first receipts from the Croton water rents were forthcoming, and opinions differed widely as to the disposition which should be made of them. The Croton Aqueduct board believed that these water rents should be applied to the sinking fund for the redemption of the bonds. The comptroller held that they should be applied first to meet the current expenses of the Croton Aqueduct works; secondly, to the payment of interest on the bonds, and only lastly to the redemption of the stock. He estimated that under his plan the whole city debt could easily be paid off as it fell due, while, under the method proposed by the Aqueduct board, accumulations of the sinking fund would equal the whole city debt twenty-two years before the last of it became payable, whereby, he claimed, too great a burden would be cast upon the taxpayers of the day to the unjust advantage of posterity.[1]

In 1843 the board of aldermen requested a report from the comptroller, the street commissioner and its finance committee in regard to the expediency of selling the real estate of the city not in use or required for public purposes. This report, which was rendered on December 29, 1843, made the proper subject of its inquiry an excuse for dealing with a far wider reaching question—the reorganization of the sinking fund; and incidentally it settled the mooted problem of the disposition to be made of the water revenue.[2]

The committee began by reciting that "the City is now burthened with a heavy debt, demanding annually, for the payment of interest, the levy of a large sum in the form of a tax upon the property of our citizens"; and stated that the means of reducing taxes were easily available by the sale of the valuable real estate owned by the corporation which, on account of its unimproved

[1] *Compt. Rep.*, 1842, p. 121.

[2] *Documents, Bd. of Ald.*, Vol. X., p. 585.

condition, yielded nothing in the form of revenue to the city treasury. The report continues:

It has, much of it, for more than a century, been a direct burthen upon the taxable property of the City, as corporate property producing, as before stated, for that long period, little or no revenue *and paying no tax.*

Not only are the improvements, generally, such as tend to a low valuation, comparatively, of this property in our tax lists, and the revenue derived from it greatly inadequate to its present actual value, but that revenue is expensively and neglectfully collected. Public bodies like ours, potent and powerful, though they be in name and prerogative, make but indifferent landlords. They perform their functions, as such, through agents appointed, not so much with reference to their practical qualifications for the place as to their politics; not so much with reference to their ability and faithfulness in the collection of money, as to their skill and influence in collecting suffrages. The result may be deduced without any great forecast. We have sometimes good agents, and sometimes very poor ones, and last and worst, sometimes very corrupt and dishonest ones, who sink, by their defalcations, a large portion of the revenue, of which the collection is entrusted to them.

To avoid the necessity of these agencies to collect the value of that which produces an inadequate revenue, at best, into the fund to which it stands pledged, to apply it there to the final liquidation of the principal and interest of the debt which it has been devoted to secure, seems a primary object to be attained; and this object, your Committee think, will be most successfully accomplished by providing for the sale and disposition of the improved real estate of the city, in the mode suggested by the Ordinance.

* * * * * * * *

Existing Ordinances provide only for the administration of the Fund as it comes into the Commissioners' hands in cash. The proposed Ordinance in addition to this, is intended to establish a permanent policy in the management and sale of the unconverted property of the City, pledged to the Sinking Fund.

The objects to which this Fund ought to be devoted are two-fold; one for the liquidation of the *principal* of the City debt, and the other the payment of the *interest* as it accrues.

This has already been legislated upon by the State Government. It is enacted that the revenues assigned by the Corporation for the extinguishment of the debt, be permanently pledged for that purpose. The Ordinances of the Corporation fully respond to this. It has likewise been enacted that all other revenues of the Corporation, be pledged to the payment of the interest thereon; and in the same law, the State pledge themselves to pass all other necessary laws to levy a proper tax, in case these revenues should at any time prove insufficient.

These revenues were sufficient, until the creation of the Water debt, and thereupon, the legislature, in conformity with its pledge, passed a permanent law for the levying of this deficiency annually.

The Corporation, although it has always paid the interest, has never passed, in the form of an ordinance, a provision in conformity with the State pledge; and this is proposed in the Ordinance now submitted by your Committee.

THE SINKING FUND ORDINANCE OF 1844.

By this ordinance (which was approved by the mayor on February 22, 1844), the pledges of revenue for the redemption of the debt

were left practically unchanged, although a more complete and detailed method was provided for the speedy sale of the city's lands; but nearly all the remaining revenues of the city,[1] including water rents, were pledged to a separate sinking fund, the complete title of which was "The Sinking Fund of The City of New York for the Payment of the Interest Accruing and to Accrue upon the Stocks of The City of New York until the Same be fully and finally Redeemed."[2] The duties and powers of the commissioners of the sinking fund were prescribed with considerable detail and provision was made for the collection by taxation of the amount by which the revenues of the "Interest Fund" might fall short of the annual interest charges on city stock.

The plan of providing elaborate sinking fund machinery for meeting annually recurring interest charges seems rather remarkable. In the ordinary conception of a sinking fund there inhere two fundamental ideas: (1) debt redemption by anticipated payments, and (2) accumulation by the accretion of compound interest. Anticipated payment of *interest* on public securities is unknown except within such narrow limits as to be useless for purposes of amortization. The idea of accumulation seems equally inapplicable. It is obvious that so far as interest on debt is concerned, its periods of payment will substantially be of as frequent occurrence as the availability of the sinking fund resources. If, therefore, the amount of the available income equals or is less than the annual interest charge, there can be no accumulation; for the income will be no sooner received than it must be paid out. In such an event there can be no useful purpose in creating a "fund" for the performance of so simple a function. If, on the other hand, the amount of annual revenues exceed the amount of interest charged thereon, accumulation will undoubtedly ensue, but with the sole result of locking up money of the taxpayers for some problematical end which, at least, cannot be said to be in sight.

It has not been uncommon, in the creation of sinking funds, to charge them simultaneously with the payment of accruing interest, as well as with the duty of redeeming the principal of funded

[1] In 1859 it was found that the sinking fund ordinance of 1844 had not, in its enumeration of revenues pledged thereto, exhausted all the revenues of the city, and these unpledged revenues (the sources of which had not existed in 1844) were credited to an account created on the books of the corporation, entitled the General Fund (subsequently known as the General Fund for the Reduction of Taxation).

[2] For the sake of brevity these two funds will generally be referred to hereafter as the "Redemption Fund" and the "Interest Fund."

indebtedness; but where this double duty operates upon a single fund, no particular inconvenience can result, since whatever is left of the annual revenues, after the payment of the interest, can be applied automatically to purposes of redemption or absorption of new issues. But in the sinking fund ordinance of 1844 two distinct funds were created, wholly independent of one another, and consequently affording neither aqueduct nor storage reservoir for the overflowing revenue of the sinking fund for the payment of interest. It is true that at the time the ordinance of 1844 was passed there was no true conception of what the future receipts from water rents would be. Even Comptroller Douw D. Williamson, in his argument in 1843, designed to emphasize the probable adequateness of these receipts, only estimated that for the thirty-eight years from 1843 to 1880 inclusive, they would amount to $14,475,000. In fact, they amounted, during this period, to $34,016,699.46. The financiers of that time were more interested in the question of supplying from taxation the deficiency in the annual interest charges left after the application thereto of water revenue than in planning for the disposition of what may have then seemed a very improbable surplus in those revenues. Owing to the rapidly increasing revenues from water rents, however, the necessity for resorting to taxation to supplement the resources of the interest fund ceased with the year 1850, as exhibited by the following table:

REVENUES AND DISBURSEMENTS OF THE "INTEREST FUND" FROM 1844 TO 1851 INCLUSIVE.

YEAR.	CROTON WATER RENT.	DOCK AND SLIP RENT.	FERRY RENT.	TAVERN & EXCISE LICENSES.	TAXATION.	TOTAL REVENUES.[1]	INTEREST CHARGE.
1844	$108,242.02	$34,897.00	$31,705.90	$84,987.10	$302,517.15	$570,525.28	$529,151.43
1845	157,791.66	68,424.88	46,786 20	85,079.89	375,000.00	770,410 50	754,672.59
1846	193,914.70	71,876.47	49,788.10	86,563.19	300,000.00	739,410.88	761,099.79
1847	221,635.10	75,866.39	50,730.00	41,565.55	300,000.00	771,048.86	765,417.25
1848	255,053.09	92,785.12	49,750.00	47,406.92	276,000.00	799,204.15	771,348.45
1849	278,811.72	100,208.13	50,127.04	48,746 29	250,000.00	800,678.25	779,089.96
1850	458,951.87	108,488.98	50,982.50	53,493.05	186,689.00	943,842.76	770,764.69[2]
1851	458,789 78	97 706.41	53,270.00	60,221.63	.....	751,154.24	765,733.82

[1] The sources of revenue of the Interest Fund during this period were, in addition to those specifically enumerated above: (1) Common Land Rent, (2) Ground Rent, (3) House Rent, (4) Water Lot Rent, (5) Interest on bond and mortgage (6) Interest generally, (7) Mayoralty Fees. (8) Court Fees and Fines, (9) Fines and Penalties, (10) Police, (11) Sewer Permits, (12) Commutation of Alien Passengers, (13) Sales of Personal Estate.

[2] The balance (surplus) in bank on December 31, 1850, was $964,046.52.

The sinking fund ordinance of 1844 was in its inception entirely the creation of the local authorities. In the following year, how-

ever, its provisions were re-affirmed and embodied in the law of the state by the legislature. A memorial was presented to that body by the common council, with a bill for borrowing $500,000 for the Croton Aqueduct, the fifth section of which declared that the ordinance of 1844 should not be altered except to add to the "fund for the redemption of the debt" without the "consent of the legislature first had and obtained," and that the said ordinance should remain in "full force until the whole of the debt created for the introduction of the Croton water into the city of New York shall be fully redeemed." [1]

In 1856 the receipts of the "interest fund" were $1,136,852.65, which, with the cash surplus on January 1st of that year, aggregated $2,406,620.65, against which were charged interest payments of only $766,688.81. This tempting surplus seems to have been partly disposed of by the following method, which was evidently dictated by the temporary needs of the city treasury. The cash means of the "redemption fund" for the year 1856 were $1,434,085.19. Its redemptions of and new investments in funded debt amounted only to $1,065,459; but it had also invested $700,000 in revenue bonds of the city issued for current expenses in anticipation of the collection of taxes. This left a deficiency which was made good by the simple method of "advancing" $332,131.72 from the "interest fund." It was proving inconvenient to preserve the unnatural separation of the two funds. In 1857 this "advance" had increased to $386,325.60. On December 31, 1858, the interest fund had accumulated a surplus over and above all existing charges against the same of $2,579,534.12, and the ever increasing embarassment of this anomalous feature of municipal finance led, in the following year, to the passage of Chapter 406 of the Laws of 1859, which authorized the transfer of this surplus to the redemption fund.,

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[1] Ch. 225, L. 1845.

[2] The preamble of this act read as follows:

"WHEREAS, the revenue set apart and mentioned in title two of the ordinance of the mayor, aldermen and commonalty of the city of New York, entitled 'An ordinance providing for the redemption of the city debt, and the payment of the interest thereon,' passed February twenty-second, eighteen hundred and forty-four, being the revenues pledged and appropriated to the payment of the interest upon the said city debt, have accumulated after the payment of all interest provided for in said ordinance to be paid on said debt and chargeable to said sinking fund for the payment of the interest on said debt, so that on the first day of January, eighteen hundred and fifty-

This amount was transferred as of January 1st, 1859. During the year 1859, $542,501.02 was transferred; in 1860, $776,674.13; and in 1861, $683,495.75—making a total of $4,582,205.02.

APPLICATION OF SURPLUS REVENUES TO THE REDUCTION OF TAXATION.

This practical consolidation of the redemption and interest funds was not permitted long to continue. The unequal and therefore unfair adjustment of the debt burden as between present and future taxpayers, which resulted from the unnecessary segregation of nearly all the city's revenues, could not long escape the attention of the city's financial officers, naturally solicitous as they were to reduce the weight of taxation. The disparity between the redemption requirements of the city debt and the means set apart to effect that redemption had been accentuated by the action of the legislature in ignoring the interest fund in numerous acts passed subsequent to 1844 which provided that the interest on bonds thereby authorized to be issued should be paid from taxation.[1]

In 1862, Comptroller Robert T. Haws in a communication to the common council[2] recommended that legislation should be secured which would permit the surplus revenues of the interest fund to be applied to the reduction of taxation. After calling attention to the fact that the interest fund was charged with the payment of interest only upon the Water Stock, the Fire Indemnity Stock and the Building Loans Nos. 3 and 4, and that the interest on the greater portion of the then existing debt was by law payable from taxation, he stated:

Instead of applying such surplus to the unnecessary augmentation of the Sinking

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nine, they amounted to the aggregate sum of two millions five hundred and seventy-nine thousand five hundred and thirty-four dollars and twelve cents;

"AND WHEREAS, there is no object to which said sum and the accumulations which may hereafter arise from said revenues can be applied, as no power exists by which the commissioners of the sinking fund mentioned in said ordinance, can invest said moneys permanently;

"AND WHEREAS, it is desirable that said surplus and the accumulations which may hereafter arise from said revenues, after the payment of all interest on said debt, should be transferred to the sinking fund for the redemption of the city debt provided for in said ordinance; therefore," etc., etc.

[1] On January 1, 1862, bonds were outstanding to the amount of $3,788,000, the principal of which had also been made payable from taxation by the laws authorizing their issue.

[2] *Documents*, 1862, No. 8.

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Fund for the Redemption of the Principal of the Debt, as has been done during the last few years, it is proposed to appropriate the amount to the payment of interest and the general expenses of the corporation, which by existing laws are provided for wholly by taxation.

He submitted an estimate showing that the redemption fund would, without the assistance of the surplus revenues of the interest fund, be far more than sufficient to extinguish as it matured the entire existing debt payable therefrom.

As a consequence of these representations, the legislature by Chapter 163 of the Laws of 1862, authorized the transfer of the surplus revenue of the interest fund to the general fund "to be applied to the diminution of the taxes of said city."

In pursuance of this act there was transferred to the general fund during the seventeen years from 1862 to 1878, inclusive, the sum of $17,290,713.

THE BONDED INDEBTEDNESS ACT OF 1878.

During these seventeen years, there was an immense growth in the city's debt. Among the chief purposes for which bonds were issued during this period may be mentioned the improvement of Central Park, the war expenditures for bounties, etc., ($14,597,300), the wasteful undertakings of the Tweed ring and the refunding of floating indebtedness which necessarily followed its overthrow.

The funded debt increased from $25,738,042 in 1862 to $121,440,133 in 1878. Nearly all these new bond issues had been made payable, principal and interest, from taxation, so that on January 1, 1878, the state of the city debt and the sinking funds was as follows:

Funded debt payable from taxation,	$99,930,089.68
" " " " sinking fund,	21,510,043.47
Total Funded Debt,	$121,440,133.15
Deduct securities held by sinking fund,	31,080,007.54
Net Funded Debt,	$90,360,125.61

This situation naturally forced the serious attention of the local authorities. The sinking fund held securities amounting to nearly ten millions of dollars more than the entire debt which it was pledged to redeem. Nearly four-fifths of the entire city debt was payable from taxation, and the redemption dates of that debt had been so unevenly distributed that abnormal amounts would

have to be inserted in the budgets of certain years unless other provision should be made for its payment. The average revenues of the sinking fund for the preceding five years had exceeded three millions of dollars, and these revenues were steadily increasing. The last bonds payable from the sinking fund did not mature until 1917 at which time the surplus in the fund, if allowed to continue to accumulate uselessly, would reach Brobdingnagian proportions.

Comptroller Kelly on January 9, 1878, submitted to the mayor a draft of a bill to be presented to the legislature together with a memorial explaining its provisions.[1] Comptroller Kelly's scheme contemplated the following legislation:

(1) The sinking fund for the redemption of the city debt was to be continued and after providing for the payment of the bonds and stocks of the city payable therefrom as provided by law, should form a fund for the payment of the bonds and stocks *then outstanding* which had been made payable from taxation.

(2) All moneys and revenues heretofore pledged to the sinking fund to continue to be so pledged "until all of said bonds and stocks of the said city shall be fully and finally redeemed."

(3) The surplus revenues of the interest fund were to be definitely pledged to the redemption fund—in effect there being a new consolidation of these two funds.

(4) In consideration of the redemption by the sinking fund of outstanding assessment bonds, the proceeds of collections of assessments for local improvements completed or under contract at the time of the passage of the act were to be likewise pledged to the sinking fund.

(5) An amount not exceeding one million dollars a year was to be raised by taxation for the sinking fund whenever the commissioners of the sinking fund should certify to the board of estimate and apportionment that the accumulations of the sinking fund would not be sufficient to meet the payment of bonds falling due in the next following calendar year, and if this provision should still be found insufficient for that purpose, authority was to be given to issue refunding bonds payable within twelve years.

(6) For the payment of all bonds and stocks to be "*hereafter issued* pursuant to the provisions of any statute authorizing the same and which by the provisions of such statute are payable

[1] *Documents, Bd. of Ald.*, 1878, No. 2.

from taxation," regular amortizing installments were to be included in the annual tax levies.

(7) A new provision of law was recommended, the subsequent effects of which have been so important that it is quoted in full as follows:

> **Between the city and its creditors, holders of its bonds and stocks as aforesaid, there shall be and there is hereby declared to be a contract that the funds and revenues of the city and the funds to be collected from assessments as aforesaid, by this statute pledged to the Sinking Fund for the Redemption of the City Debt, shall be accumulated and applied only to the purposes of said Sinking Fund as herein provided, until all of said debt is fully redeemed and paid.**

The form and substance of Comptroller Kelly's proposed statute were undoubtedly influenced by the political conditions of the time. The factional antagonisms of the day were such that the state legislature and executive were certain to look with suspicion and distrust upon any recommendation emanating from the local authorities. Doubtless with a view to meeting all possible objections of a technical character, the Comptroller's bill was drawn in a manner which disclosed an unfortunate timidity of purpose. In the effort to appear to guard with zealous fidelity the interests of the bondholders entitled to the security of the pledged revenues of the sinking fund, and to create additional revenues for the benefit of purchasers of bonds to be thereafter issued, this bill was padded with pledges for the future which were not only unnecessary but were destined to work great inconvenience to the financial administration of the city. Especially was this true of the "contractual pledge" above quoted. Even this bill, however, when passed by the legislature was vetoed by Governor Robinson who claimed that the rights of holders of bonds payable from the sinking fund were violated, objected to the refunding provisions, and recommended that the $1,000,000 appropriation in the budget should be changed from a maximum to a minimum amount. The bill, having been modified so as partly to meet his objections, finally received his signature and became Chapter 383 of the Laws of 1878. This act which is commonly referred to as the "Bonded Indebtedness Act," committed the city to an indefinite bondage to the "pledged revenue" fetich from which it has never been able wholly to free itself.

In 1878 the time was ripe for a reorganization of the sinking fund system upon rational and scientific lines. It is obvious that at this time no bondholder could legitimately demand greater

security for his debt than a sinking fund which possessed assets nearly fifty per cent in excess of the entire debt payable therefrom. Wise statesmanship would have demanded, and good faith would have warranted, the diverting of all subsequent revenues of the sinking fund to the general fund for the reduction of taxation (partially accomplished during a period of seventeen years under the provisions of Chapter 163 of the Laws of 1862), and establishing new sinking fund regulations under which there should be raised each year by taxation amortizing installments exactly sufficient with their accumulations of compound interest to redeem all new debt at its maturity.[1] Such a departure would have proved most beneficial to the future management of the city's finances. If, however, unreasoning popular belief in the "pledged revenue" system seemed to demand its continued existence, there was no financial necessity for superimposing upon this system new provisions for additional revenue from taxation. The revenues of the sinking fund (amounting then to about three millions annually) were for practical purposes entirely "surplus"; and this surplus might properly have been charged (as it was eleven years later by the act of 1889), with the redemption of subsequently issued funded debt. But in 1878, as in earlier and later instances of legislative tinkering with the sinking funds, it was only the pressing financial inconveniences of the hour which controlled. The future might care for itself. The problem then seemed to revolve about these questions only: First, how to redeem otherwise than from taxation four-fifths of the public debt which, as originally issued, had been made thus redeemable; and secondly, how to dispose of an additional burden of $21,320,500 of assessment bonds for the redemption of which it was known that the revenues applicable thereto would be greatly deficient.[2] These ends were accom-

[1] The writer is neither unaware of the argument which might be drawn from the provisions of Chapter 225 of the Laws of 1843, nor forgetful of the reasoning of Corporation Counsel Lacombe in his Sinking Fund opinion of November 28, 1884; but the theoretical benefits to be obtained in 1878 from a close, technical construction of sinking fund law were of such extreme tenuity, and the practical advantages of a common-sense construction so manifest, that it seems scarcely conceivable that adverse criticism could then have attached to any serious effort to reorganize the sinking fund system on a scientific basis. The situation was entirely different from that presented by the passage of the Act of 1889.

Professor Durand in his *Finances of the City of New York* (p. 310), holds similar views to those here expressed.

[2] Most of this large indebtedness had been incurred for street improvements begun during the Tweed regime, assessments for which had been frequently vacated or remitted by the courts owing to frauds and irregularities of various kinds.

plished, but in their accomplishment a sinking fund system was created so burdensome in its nature that it is not astonishing that only eleven years later further legislative interference was invoked and obtained in spite of the "contractual pledge" of 1878.[1]

By the change in the disposition of the surplus revenue of the interest fund—*i. e.*, from the general fund for the reduction of taxa-

[1] This period was an important one in the history of the city debt. On November 4, 1884, the constitutional amendment was adopted which prohibited cities of over one hundred thousand inhabitants from becoming indebted in excess of ten per centum of the assessed valuation of real estate, with an exception as follows: "Nor shall this section be construed to prevent the issue of bonds to provide for the supply of water, but the term of the bonds issued to provide for the supply of water shall not exceed twenty years, and a sinking fund shall be created on the issuing of said bonds for their redemption, by raising annually a sum which will produce an amount equal to the sum of the principal and interest of said bonds at their maturity." Ten per cent of the assessed valuation of the city on January 1, 1885 was $111,976,159.70. The total bonded debt, exclusive of revenue bonds, was $125,810,579.33, of which $85,479,579.33 was held by the sinking fund. If, as Corporation Counsel Lacombe had held, the constitutional restriction ran against the gross debt, the city would have exceeded this limitation. An attempt to issue $2,000,000 bonds for dock purposes was at first successfully enjoined by certain taxpayers and bondholders, and for a while new public improvements were suspended, but the Court of Appeals finally decided (Bank for Savings *v.* Grace, 102 N. Y. 313), reversing the courts below, that stock purchased by the sinking fund was "not a debt against the city within the meaning of the constitutional prohibition."

Prior to 1889 the constitutional provision above quoted relative to the creation of a sinking fund for water bonds required no particular attention, since, under the provisions of the Bonded Indebtedness Act amortizing installments were being raised for the redemption of *all* bonds issued since 1878. The view seems to have been taken, however (see *Minutes Com. of the S. F.*, Jan. 6, 1885), that this provision required the creation of such a distinct fund, regardless of the question, whether the constitutional limit of indebtedness had been exceeded by the city, and on January 16, 1889, the commissioners of the sinking fund adopted the following resolution:

"*Resolved*, that the Comptroller be and is hereby authorized and directed to separate the amounts of annual installments raised by tax for the payment at maturity, of bonds issued for the supply of water, pursuant to section 11, of Article VIII, of the State Constitution, to be kept as a distinct fund from the general account, and designate the securities in which the moneys are invested, to be reported from time to time, to this Board."

Thereafter these installments with their accumulations of interest and the stocks in which they were invested were segregated into a separate sinking fund known as "Sinking Fund for the Redemption of the City Debt, No. 2." Chapter 178 of the Laws of 1889 (see *post*) was drawn under a similar misapprehension, but three years later the Court of Appeals decided (City of Rochester *v.* Quintard, 136 N. Y. 221) that this provision had no application to a city whose indebtedness did not exceed the constitutional limit. Undoubtedly, had this been understood to be the law in 1889, the amendment to the Bonded Indebtedness Act passed in that year would have provided that the installments for water bonds might be provided from the surplus revenues of the redemption fund instead of from taxation.

tion to the redemption fund—there was added to the accumulation of the sinking fund during the ten years, 1879–1888, inclusive, the sum of $21,650,000—the effect of which was the same as though this amount had been raised directly by taxation. In 1879, the "minimum" appropriation of $1,000,000 provided by the Bonded Indebtedness Act was included in the tax levy.[1] In the next nine years the sinking fund installments raised by taxation under the provisions of the eighth section of the act, amounted to $4,880,696.69.

Coincidently the ordinary revenues of the redemption fund, especially from dock rents continued to increase. The annual revenue, which in 1877 had been $2,909,066.14, grew by leaps and bounds until in 1888 it amounted to $8,903,284.80.

As these revenues exceeded the average annual issues of bonds during this period, the net funded debt (including assessment bonds and excluding revenue bonds), decreased from $111,649,317.91 to $88,120,405.34. This was too rapid a pace in debt extinction for the local authorities of the time.

The budget for the year 1878 had been $30,079,077.12; in 1888 it had grown to $37,051,053.93. It was generally agreed that a reduction of the burdens of taxation would be popular and desirable—even necessary. Debt amortization was proceeding at a rate which was not fair to the present generation. The experience of 1862 was about to be repeated, with this difference, however: that, whereas at the earlier date the diversion of the surplus revenues of the interest fund had awakened little if any protest, an attempt at this time to devote any of the revenues of the sinking fund to the reduction of taxation was bound to be open to the charge of a breach of faith founded on the solemn statutory pledge contained

[1] The act as finally passed required the board of estimate and apportionment to insert in the budget such an amount as the commissioners of the sinking fund should certify to be necessary to meet the payment of any bonds or stocks falling due in the next following calendar year, by reason of an insufficiency in the accumulations to the sinking fund; "provided, however, that the amount so to be raised by taxation and paid into the Sinking Fund, as in this section provided, shall not in any one year be less than the sum of one million dollars nor more than two million dollars." The sum of one million dollars was inserted in the tax levy for the year 1879 in pursuance of the provisions of this section, but this item never afterwards reappeared in the budget. The obviously excessive resources of the sinking fund led to a construction of the somewhat ambiguous phraseology of the act in regard to this appropriation, under which it was held to be required only when actually needed for the redemption of bonds maturing in the next calendar year.

in the act of 1878, declaring that a *contract* existed between the city and its creditors that all the revenues of the sinking fund should be applied only to its purposes until the entire debt payable therefrom should be finally redeemed and paid. What was really done was, in fact, a clear repudiation of this pledge. The method pursued was rather involved, but may be briefly summarized as follows:

(1) The annual installments required by the Bonded Indebtedness Act of 1878 to be raised for the redemption of bonds issued after June 8, 1878, were no longer to be provided for by taxation, but might be "set apart" out of the surplus income, revenues and accumulations of the sinking fund for the redemption of the city debt after fully providing for the payment of the stocks and bonds which had been made preferred claims or "liens" of said fund.[1] Recourse was to be had to taxation only in the event of these surplus revenues becoming insufficient. This provision did not affect the annual installments raised by taxation for bonds issued for water purposes under the supposed requirements of the constitution, but its immediate effect, was, nevertheless, to reduce taxation in the sum of $975,739.02.

(2) The sinking fund for the payment of interest on the city debt was charged with the new duty of paying "interest on bonds and stocks of said city purchased and held and to be purchased and held for investment by the commissioners of the sinking fund." The amount of such interest on January 1, 1889, was $1,617,915.54.

[1] Under the Bonded Indebtedness Act the "liens" on the sinking fund were in the order of their priority, as follows:

1. Bonds payable from the sinking fund under the ordinance of 1844, and other ordinances of the common council authorizing their issue. The amount of such bonds outstanding on January 1, 1889, was $4,593,400.

2. Bonds issued under the provisions of § 6, Ch. 383, L. 1878 (§ 176 Con. Act) to refund or redeem before maturity bonds issued prior to June 8, 1878, which by the terms of their issue had been made payable from taxation. The amount of such bonds outstanding on January 1, 1889, was $9,700,000.

3. Bonds issued after June 8, 1878, for the payment of which no provision otherwise than from taxation had been made in the statutes authorizing their issue. The amount of such bonds outstanding on January 1, 1889, was $23,667,553.11 (exclusive of water bonds to the amount of $20,900,000, for which annual installments were raised by taxation and credited to "Redemption Fund, No. 2").

4. Bonds issued prior to June 8, 1878, originally payable from taxation. Amount outstanding on January 1, 1889, was $68,828,142.

Subsequently, under the provisions of Chapter 79 of the Laws of 1889, the bonds issued for the new parks in the 23rd and 24th wards and in Westchester county were made a direct charge upon the sinking fund.

By charging this amount against the interest fund instead of the tax levy, the surplus revenues of the interest fund, which the Bonded Indebtedness Act had specified as one of the pledged appropriations of the redemption fund, were, of course, depleted accordingly—a clear violation of the "contractual pledge."

Protests against this plan did not fail to appear in the public press; but so ample appeared to be the security of the city's bondholders that the validity of the act embodying these suggestions (Chapter 178, Laws 1889), has never been called into question in the courts. The legislature authorized the board of estimate and apportionment to "reconsider, revise and amend the final estimate for 1889" (passed in the preceding December), and the sum of $2,653,684.56 was accordingly stricken therefrom.

The effect of the act of 1889 upon the Bonded Indebtedness Act may be stated as follows: first, it practically repealed the provision in the act of 1878 relative to the raising by taxation of installments for the redemption of all bonds issued after June 3rd, of that year and made them a residual charge upon the ample ordinary revenues of the Redemption Fund; secondly, it brought about a partial return to the policy of the act of 1862, which permitted the surplus revenues of the interest fund to be applied to the reduction of taxation, and conceivably (if the interest due on the bonds held for investment by the commissioners of the sinking fund should increase more rapidly than the revenues of the interest fund) might some day result in the entire absorption of the fund for that purpose.[1]

The revenue of the redemption fund dropped from $8,903,284.80 in 1888 to $6,444,761.39 in the following year. Yet such have been its recuperative qualities, due to the rapid growth of its principal sources of revenue, that its revenue amounted to $10,266,488,07 in 1897 and $12,592,310.46 in 1900.[2]

[1] The practical effects of the act of 1889 upon subsequent tax levies have been as follows: The amortizing installments (which, if that act had not been passed, would have been raised by taxation) increased gradually from $975,769.02 in 1889 to $3,485,557.72 in 1900. The annual interest charge on sinking fund holdings (which otherwise would have been inserted in the tax levies instead of paid from the interest fund), increased from $1,689,450.84 in 1889 to $2,747,022.84 in 1900. The aggregate of these items, including interest compounded at three per cent (which would also have borne its share in increasing taxation), amounts to $62,085,759.95, which represents the total saving to the taxpayers during these twelve years.

[2] These figures include the amounts raised by taxation as installments on water bonds (constituting Redemption Fund, No. 2).

CONDITIONS EXISTING AT THE DATE OF CONSOLIDATION.

During the ten years preceding the Greater New York consolidation, and especially during the last three years of this period, the bond issues of the city of New York were much larger than at any other time in its history. During the years 1888–1897, inclusive, the issues (excluding $7,000,000 refunding bonds) aggregated $138,382,649.41, the principal objects of expenditure being as follows: water, $25,877,000; docks, $20,800,000; school houses, $18,725,365.97; other public buildings, $10,746,406.64; new parks in the 23rd and 24th wards, $9,823,100; other parks, parkways and drives, $11,771,493.95; assessment bonds, $13,043,536.21; repaving streets, $10,169,308; and bridges, $8,032,290.37.

The funded debt showed the following increase:

	Dec. 31, 1887.	Dec. 31, 1897.
Total Funded Debt,.....	$128,268,719.45	$223,018,033.78
Less Sinking Fund Investments,.	34,057,319.45	84,192,672.51
Net Funded Debt,.....	$94,211,400.00	$138,825,361.27

In other words the revenues of the sinking fund during this ten year period had been so large that new bond issues aggregating $138,382,649.41 had effected an increase in the net funded debt of only $44,613,961.27. It is also a rather remarkable coincidence that the net funded debt on December 31, 1897, was almost exactly the same in amount as the aggregate of bonds issued during the ten preceding years.

The sinking fund problem which had to be faced by the framers of the Greater New York charter was not simple. The sinking funds brought into the financial system of the new city from the several municipal corporations annexed to the city of New York require but little comment. From the city of Brooklyn came two: The Sinking Fund of the City of Brooklyn and The Water Sinking Fund.

The former consisted almost exclusively of annual amortizing installments raised by taxation under laws authorizing the issue of certain bonds which constituted, however, only about twenty-seven per cent of the entire funded debt of the city of Brooklyn.[1]

[1] The history of the Brooklyn sinking fund may be briefly summarized as follows:

By Chapter 129 of the Laws of 1835, amending the Act of 1834 (Chapter 92) incorporating the city of Brooklyn, authority was granted to borrow $200,000 on the credit of the city for the purpose of erecting public buildings. Chapter 156 of the Laws of

Thirty-seven per cent of the Brooklyn debt was payable simply from taxation as it matured, a little over nine per cent from collections of assessments, and the remainder—about twenty-six per cent from the water sinking fund.

The water sinking fund of the city of Brooklyn was derived from the net surplus income from the public water works after paying interest on all outstanding bonds issued for the construction and extension of said works and after discharging any other claims by law chargeable against the water revenue. It was provided, however, that when this surplus exceeded certain specified amounts the commissioners of the sinking fund might, in their discretion, apply limited portions of that excess "to the reduction of the amount which must be inserted in the annual estimate and be

1838 increased this amount to $500,000 and created a sinking fund to be fed by annual tax levy installments of $5,000 which were to be "inviolably appropriated and applied to the redemption of the loans already procured, and to be procured, under this act by the said city" (§ 8). The mayor, treasurer (afterwards changed to the auditor) and comptroller were designated as *ex-officio* the commissioners of this fund, and were authorized to invest moneys thereof in New York state or United States bonds and to purchase any part of the loans of the city of Brooklyn "before the time limited for the redemption of the same."

By Chapter 335 of the Laws of 1849 the surplus income from water rents, after deducting all expenses and charges of distribution were set apart as a sinking fund for the payment of the principal and interest of the water debt, under the management of the same commissioners.

By Chapter 22 of the Laws of 1850 a separate sinking fund was directed to be created to be called "the Sinking Fund to discharge existing liabilities," and to be composed of ten annual installments to be raised by taxation to redeem bonds which, to the amount of $65,000 were authorized to be issued to fund floating indebtedness.

Chapter 22 of the Laws of 1857 directed that $50,000 per annum should be raised by tax and paid into the sinking fund for the final redemption of water bonds.

A number of acts of similar general import were passed from time to time by the legislature, each providing for annual installments.

The "Water Sinking Fund" as a special account was definitely instituted by Chapter 396 of the Laws of 1859; but in actual administration no separation was ever made of its accounts from those of the general sinking fund.

On February 24, 1890, Mayor Alfred C. Chapin in a communication addressed to the common council (*Proceedings, Bd. of Ald.*, 1890, Vol. I, p. 491) stated that the sinking fund which then amounted to $10,459,892.19, had more than doubled in seven years; that the amount of debt falling due in the next ten years was small, and as the fund had recently increased at the rate of $1,000,000 annually, the total thereof would exceed $20,000,000 before the close of the nineteenth century; that the present holdings of the sinking fund exceeded in amount all the permanent debt falling due in the next fifteen years, and concluded that the fund had been "over supplied very substantially at the expense of the taxpayers during the past few years." This conclusion was largely based upon the principle that the debt service for revenue-producing public improvements should be a charge on such revenue, and upon the assumption that the revenue from the

raised by taxation to meet the interest on any of the bonds or obligations of the city of Brooklyn."[1]

Three small sinking funds came from Long Island City: one for the redemption of revenue bonds under the provisions of Chapter 782 of the Laws of 1895; one for the redemption of fire bonds under Chapter 122, Laws of 1894, and one for the redemption of water bonds under Chapter 759, Laws of 1895.

It was apparent to the framers of the Greater New York charter that each of these sinking funds might be permitted to work out its own ends without inconvenience to the taxpayers and without the necessity of amendatory legislation. The one difficult problem was the disposition to be made of the great redemption fund of the former city of New York with its tributary interest fund, and what scheme to apply to the redemption of bonds to be issued by the new city after the date of consolidation. As had so frequently happened before, political exigencies rather than economic principles determined this question. The Greater New York con-

New York and Brooklyn Bridge and the water system would largely increase. He believed that it would be proper to cancel bonds held by the sinking fund to the amount of $7,333,000, but in view of the fact that $816,000 of water debt fell due in the following year he recommended that only $6,371,787.37 be cancelled, involving a reduction of the annual interest charge of $314,069.50. These recommendations, though plainly threatening the efficiency of the sinking fund, were carried into effect after the passage of Chapter 453 of the Laws of 1890 by the commissioners of the sinking fund, who on June 27 and June 30, 1890, cancelled $6,438,787.37 of its holdings (mss. *Min. Com. of the S. F.*, 1890, pp. 62, 63).

The efficiency of the Brooklyn sinking fund has been greatly impaired by frequent instances of maladministration, sometimes due to legislative action vacating or reducing assessments pledged to redeem bonds which had been paid from the sinking fund, though to some extent such losses have been offset by the method adopted in the city of Brooklyn of calculating annual amortizing installments without regard to future accretions of compound interest.

Prior to the date of this communication of Mayor Chapin, bonds to the amount of $4,133,466.41 had been issued payable from taxation in series of years and without sinking fund provision being made therefor. This practice was continued until 1895, when by Chapter 648 of the Laws of that year, amortizing installments were directed to be raised for the redemption of all bonds thereafter to be issued "pursuant to the provisions of any statute authorizing the same, but which by the provisions of such statute, are payable from taxation, other than revenue bonds issued in anticipation of the collection of taxes." This act also contained a provision, modelled closely after the New York city Bonded Indebtedness Act of 1878, authorizing any excess or surplus in the sinking fund to be applied to the liquidation of bonds not by the terms of their issue originally payable therefrom. In view of the methods adopted in administering this fund, it is difficult to see how any such surplus could have been expected to arise.

[1] § 15, Title IV, ch. 583, L. 1888.

solidation had been vigorously opposed by a small but determined minority of influential taxpayers. Threats had been made openly that the constitutionality of the forthcoming charter would be attacked in the courts, and one of the most obvious points of attack was to be found in the "contractual pledge" to the holders of bonds of the former city of New York, that all the enormous revenues of the redemption fund should continue to be accumulated until that fund had redeemed the last bond payable therefrom.

It was determined to avoid this point of attack. The revenues of the redemption fund were to be applied solely for the benefit of bondholders of the old city entitled to its security. At the same time new sinking funds were created for the amortizing of debt to be issued by the new city, to be composed of installments to be raised annually by taxation, which, with the accumulations of interest thereon should be "sufficient to meet and discharge such bonds or stocks by the time the same shall be payable."

Two new funds of this character were created: one, entitled "The Water Sinking Fund of The City of New York" [1] which had for its purpose "the liquidation of the principal of the debt incurred by the city of New York, as hereby constituted, on or after January 1, 1898, for the supply of water as provided by section ten of article eight of the constitution of the state of New York"; the other, entitled "The Sinking Fund of the City of New York," [2] which had for its purpose the liquidation of the principal of all other funded debt likewise incurred "as to which no provision for the payment thereof otherwise than from taxation is made."

The president of the council was substituted for the recorder as a member of the sinking fund commission, the new funds were to be administered "in like manner as provided by the ordinance of the mayor, aldermen and commonalty of the city of New York, approved by the mayor, February 22, 1844, so far as the same may be applicable," and it was provided that the board should, in respect to the eight sinking funds antedating consolidation, administer the same "and perform, carry out and exercise the several trusts, powers, obligations and duties relating thereto, in the same manner as the same would have been administered, performed, carried out and exercised if this act had not been passed." As to all future issues of bonds in which investments might be

[1] § 208, *Greater New York Charter.* [2] § 206, *Ibid.*

made by any of the sinking funds, accruing interest was to be provided for by taxation, such charges upon the interest fund being thereby limited to the holdings on December 31, 1897, by the redemption fund of bonds of the former City of New York.[1] The "contractual pledge" of the Bonded Indebtedness Act was re-enacted,[2] and it was provided that

> The assets and accounts of each of said sinking funds shall, except as hereinafter otherwise provided be kept separate and distinct and the same shall in all respects be administered as independent trusts, subject to and governed by the several provisions of law or ordinance heretofore relating thereto, with the intent and purpose of preserving inviolate the rights of holders of bonds and stocks heretofore issued by any of the municipal and public corporations or parts thereof hereby made part of the City of New York including the Counties of Kings and Richmond.

Under such a scheme there was certainly little ground left for attacking the constitutionality of the new charter on account of its sinking fund provisions.

The charter commissioners seem to have been not altogether forgetful of the coming day when the redemption fund will have completed its functions, but the method adopted by them of disposing of its enormous revenues is destined to raise in the near future the same difficulties which were experienced under the Bonded Indebtedness Act of 1878. The most remote maturity date of bonds redeemable from the redemption fund is 1928. It will prove sufficiently burdensome, as will be seen hereafter, to accumulate unnecessarily the prodigious revenues of that fund for so long a period without repeating after that time the mistakes of the past. The financial inconvenience of any sinking fund system bottomed on resources derived otherwise than from taxation would seem to have been sufficiently demonstrated by the experience of New York city, lasting over a period of eighty-four years, and it would have been better to have provided for the transfer of the revenues of the redemption fund, as they become released from existing pledges, to the general fund for the reduction of taxation. Instead of that, it was provided that

> Whenever the bonds and stocks outstanding on December 31, 1897, and being charges or liens on any of the sinking funds hereby made subject to the control of the Commissioners of the Sinking Fund, shall in respect to any such sinking fund be wholly discharged, liquidated or canceled, it shall thereupon be lawful for the Commissioners of the Sinking Fund to cancel such bonds of the Corporation of the City of New York, issued on or after January 1, 1898, as may be held by such sinking fund and the revenues of such sinking fund when thus relieved of such liens or charges shall thereupon and

[1] § 209, *Greater New York Charter.* [2] § 211, *Ibid.*

thereafter be paid into the Sinking Fund of the City of New York, as herein created.[1]

And it was furthermore provided that the amount of such payments into the sinking fund of the city of New York should be deducted from the annual tax levy installments. Practically this was a return to the system provided by the Bonded Indebtedness Act, as amended by the Act of 1889.[2]

The effect of this provision can best be appreciated by forecasting the probable condition of the sinking fund in 1928 when this contemplated transfer might take place.

EMBARASSMENT WHICH WILL RESULT FROM THE EXISTING SYSTEM.

On December 31, 1897, the outstanding funded debt of the city of New York payable from the redemption fund No. 1 (excluding water bonds issued after the constitutional amendment of 1884) was $169,264,197.57. The investments and cash of redemption fund No. 1 on that date (excluding in the same manner the assets of redemption fund No. 2) amounted to $72,333,286.91—or $96,930,910.66 less than the entire debt redeemable therefrom.

During the five year period, 1888–1892 inclusive, the revenues of the redemption fund (excluding always the installments for water bonds) were $32,846,750.91. During the next five year period 1893–1897, inclusive, such revenues were $37,229,773.59. This shows an increase of more than thirteen per cent. For obvious reasons the future percentage of increase in the revenues of the redemption fund is likely to exceed rather than fall short of this figure.

During the period 1898–1900, inclusive the aggregate revenues of redemption fund No. 1 show an increase of more than sixteen per cent over the revenues of the preceding three year period. While this has been due to a slight extent to the accidental results of *con-*

[1] Professor Durand in his *Finances of New York City* (p. 318), expresses the hope that the provision above cited will not be interpreted "so as to require heaping up accumulations after the funds have fully equalled the bonds payable from them, but before such bonds are due." Unfortunately the language of the law seems wholly free from ambiguity on this point. As to whether the legislature would be justified in amending this provision so that it should operate when the redemption fund investments equalled the entire debt payable therefrom involves distinctly the same interesting question which presented itself at the time of the passage of the Bonded Indebtedness Act of 1878.

[2] Except that interest on sinking fund investments in bonds issued after January 1, 1898, would continue to be paid from taxation instead of from the interest fund.

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solidation which widened the field from which certain revenues are collected, it is mainly attributable to two causes of a continuing nature: (1) Normal increase of the most important revenues, and (2) the change effected by the charter in the method of paying interest on new sinking fund investments.[1] It is manifest that as the character of the sinking fund holdings gradually changes from bonds of the former city of New York, the interest on which is paid from the interest fund, to bonds of the new city, the interest on which is payable from taxation, this percentage of increase will grow still more rapidly. On the whole, it seems very conservative to estimate that each future five year period will show an average increase of fifteen per cent over each similar preceding period.[2]

Assuming such a percentage of increase, the accumulations of this fund will, at the close of the year 1908, exceed the entire debt redeemable therefrom by $6,444,070.87, and in the year 1928, when its functions will cease, there will be an accumulated surplus of $297,659,754.15.[3] It is practically certain that this colossal investment will be in bonds and stocks of the city. At three per cent the annual interest charge on this amount alone would be $8,929,792.62.[4] The amortizing installment to be raised by taxation on these bonds would be $7,648,279.52.[5] The following year under

[1] Excluding revenue bonds, the sinking funds held on December 31, 1900, $22,974,770.21 of the debt of the new city of New York issued since consolidation.

[2] Prof. Durand assumes a considerably larger percentage of increase. *Finances of New York City*, p. 339.

[3] All of the bonds which are preferred liens on the redemption fund might finally be redeemed in the year 1910; though some of these bonds may, at the pleasure of the city, run until 1928 and 1929.

In regard to the bonds issued after June 3, 1878, it was specifically provided by Ch. 178, L. 1889, (§192 Con. Act) that the "setting apart" of the surplus revenues of the redemption fund for their amortization should continue "until other provision therefor may be hereafter made by law." It is clear, therefore, that as to this latter class of bonds the holders thereof possess none of the contractual rights of the preferred lienors, and that the legislature may at any time alter this provision of law without the slightest violation of good faith. Until such legislation is obtained, however, the revenues of the redemption fund must be regarded as pledged until 1928, which is the most remote maturity date of the bonds payable under the provisions of Ch. 178, L. 1889.

[4] It is useless to attempt to forecast the additional interest which would be paid in 1928 on other bonds outstanding (not held by the sinking fund) as this depends upon the extent of future bond issues in all fields of municipal activity.

[5] The amount of annual sinking fund installments depend upon two factors: rate of interest assumed, and duration of the terms of the bonds. All sinking fund investments for many years have been on a three per cent basis, and this rate has been assumed. Terms of future issues are, of course, problematical, but in this calculation the average of past actual issues has been taken as a basis. The multiplier used has been 2.5678 per cent.

the provisions of the charter, all these bonds held by the redemption fund would be canceled and there would be a sudden drop in the tax-levy of $16,578,072.14.

It is certainly unnecessary to emphasize by elaboration the objections to any sinking fund scheme which permits such results. That taxation for the amortizing of public debt should bear evenly throughout the term of its existence is an elementary proposition. Nevertheless, prevailing conditions with their inevitable results are not to be gotten rid of jauntily by a mere stroke of the legislative pen. While it has been the aim of this paper to disclose the defects of the New York sinking fund system and to explain historically the causes which have led to their perpetuation, it has certainly failed of its purpose if it is not now apparent that all methods of escape from existing difficulties are likely to be attended with more or less embarrassment.

The difficulties which confronted the Greater New York charter commission of 1897 were not of their own creation. They were derived in large part from the Bonded Indebtedness Act of 1878, and reference has been made to the reasons of political expediency which induced this commission to treat the sinking fund problem with caution approaching timidity.

The commission appointed in 1900 by Governor Roosevelt to revise the charter has recommended no substantial changes in this system.[1]

The problem which demands solution is simply this: *Should* the solemn pledge to the holders of bonds of the city of New York contained in the Bonded Indebtedness Act of 1878 and continued *to*

[1] The writer, as a member of that commission, feels that a few words of explanation may not be improper in respect to this omission. This commission had *allotted* to it by legislative enactment a period of time scarcely sufficient to perform in a satisfactory manner the difficult task with which it had been charged. Especially in the last months of its labors human endurance was taxed to its limits in disposing of those leading principles and details of municipal government which involved structural changes in the charter. Amendment of the sinking fund system involved no such structural change. It did involve, however, a degree of careful consideration and discussion which was at that time impossible to obtain. The writer, therefore, *did not* bring before the commission the problems which form the subject of this article, believing, first, that they were of such importance as to warrant the focussed attention of the public and the legislature; secondly, that they could be equally well treated at any session of the legislature in the near future, and lastly, that the disposition which should now be made of them ought at last to be final and the product of mature economic judgment, rather than (as has been hitherto so often the case) the hasty and ill-digested product of temporary expediency.

the present day by subsequent re-enactment be regarded as an irremovable obstacle in the way of scientific debt redemption.

On the one hand, the respect heretofore shown for this pledge may be illustrated by the following extract from a well-known and widely published opinion of one of the city's most eminent legal advisers—Corporation Counsel Lacombe:

> The idea that the sinking fund is never to be in amount in excess of the debts chargeable thereto or payable therefrom, is fallacious and must be avoided. Though called a "Sinking Fund," it is in fact a reserve fund which does not disappear when its accumulations equal the amount of the bonds to whose security it is pledged. The commissioners are entitled and bound to hold under their trust all the funds belonging or appropriated thereto, until every debt chargeable thereon is in fact paid in full, principal and interest. The creditors of that fund are entitled to the security for their debts afforded by all the accumulations of the fund, no matter how much the surplus thereof may be. Such accumulations or surplus the city cannot take from the commissioners, nor use for any purpose whatever. It cannot be in any way put beyond the reach of the creditors of the sinking fund. It must be held intact for the purposes of the trust, and the creditors of the fund are entitled at the maturity of their debts, to be paid therefrom in the order of the priorities of their claims thereon, and, in the meantime, to have the full fund held in trust as a security for such payment.
>
> The surplus of the Sinking Fund can no more be destroyed or withdrawn from the trust, or the operation thereof, than could the equity of redemption, surplus or increased value of land covered by a mortgage or trust deed to secure a debt be destroyed, withdrawn from the mortgage or trust deed or from the operation thereof.[1]

On the other hand, the important fact of very practical import may be alleged that by the Act of 1889 the "contractual pledge" was undeniably violated, and, so ample was the security of a city bond generally regarded, that no bondholder cared to contest the validity of this statute in the courts.

Perhaps it may be said that the solution of this question lies rather in the realm of finance than of law. If so, statutory construction becomes of less practical importance than the opinion of holders of city bonds.

REMEDIES DISCUSSED.

The extent to which public creditors are influenced at the present time by the existence of sinking funds designed to provide means for the liquidation of their claims may fairly be said to be a debatable question. In the early history of public loans, when public credit was but little understood, that influence was un-

[1] The fact that one of the most important conclusions of this opinion was rejected by the Court of Appeals (Bank for Savings *v.* Grace, 102 N. Y. 313), should not deprive the reasoning of the learned corporation counsel on the point above discussed, of the respect to which it is entitled.

The increased burdens of taxation imposed upon the taxpayers of New York city by the operation of the Greater New York Charter have aroused a more critical spirit in regard to municipal expenditures than has been manifested for some time, and it is inconceivable that serious public discussion can be long postponed in regard to a subject which involves a possible lightening of the tax burden in an amount which already exceeds five millions of dollars annually, and which is destined soon to reach even much more formidable proportions.[1]

During the next few years it may be possible for the commissioners of the sinking fund to apply palliative measures by making

1638.46; in 903, $2.713,414.85; in 1904, $3,255,191.24; in 1905, $3,796,967.63; in 1906, $4,338,744.02; in 1907, $4,880,520.41; in 1908, $5,422,296.80; in 1909, $5,964,073.19, and in 1910, $6,505,849.58. It might be possible, however, for the commissioners of the sinking fund to hasten the redemption of the "preferred lien" bonds by repurchases from the public under a system of competitive bidding. Of the "preferred lien" bonds outstanding and held by the public, $475,000 mature in 1902, $20,000 in 1907 (both first liens), $6,900,000 in 1908 (second lien), $9,357,000 ("park" lien) in 1909, and $2,800,000 (second lien) in 1910—making a total of but $19,552,000.

[1] It may readily be imagined that in the financial administration of the city there have been not a few compensating advantages derived from the overflowing revenues of the sinking fund. The necessity for refunding operations has seldom arisen. With a modicum of forethought it has been possible to husband the resources of the sinking fund so that large amounts of maturing debt could be easily redeemed without recourse to the tax levy. By far the larger part of annual new issues of bonds have been absorbed directly by the sinking fund for investment, thus avoiding the expenses and delays of frequent public bond sales, and rendering it possible to make close adjustments of cash to the needs of the city treasury. Many actual economies in regard to liabilities on interest account have been possible, and from the standpoint of mere convenience to the fiscal officers of the city, the situation has been, in these respects, thoroughly agreeable.

It should not be forgotten, moreover, that since consolidation the city has sometimes been perilously near to the constitutional limit of indebtedness; and to the excessive contributions of the taxpayers to the debt service in the past is due the fact that the net debt of the city is not at present much larger than it is. If a change in the sinking fund system should ensue, which would result in the surplus revenues of the redemption fund being applied to the reduction of taxation, it is not unlikely that in the near future many expenditures which are now payable from the proceeds of bond sales would have to be made from taxation. This consequence, however, would not be altogether deplorable. The city of New York now defrays from bond account many liabilities which are not in the nature of permanent public improvements. Among the most striking of these may be mentioned the stock or plant of the department of street cleaning, consisting largely of horses, carts, harness, burlap bags and similar articles serviceable for but a few months, which are paid for from time to time from the proceeds of bonds maturing in thirty or forty years.

All expenses of ordinary maintenance of the dock department are similarly defrayed.

serious efforts to repurchase from the public outstanding bonds payable from the redemption fund. But it would scarcely be possible thus to redeem literally the whole of such outstanding debt; and if the redemption fund must, under the provisions of the charter, be treated as an inviolable trust fund until every bond now legally redeemable from it is paid, the relief afforded by such purchases would prove but temporary.

The repaving of streets, which in most cities is properly regarded as "maintenance," is likewise made a charge upon the public debt. Many similar instances might be cited. It would, indeed, seem that there has been in the financial history of the city an unconscious endeavor to equalize and adjust by these illogical means, the abnormal conditions which prevail in regard to the redemption of the city debt. It would be an interesting study to analyze the purposes for which the city of New York issues bonds with a view of ascertaining the extent to which payment of ordinary current expenses is thus postponed. But these considerations, though not unimportant, do not appear sufficiently weighty to offset the criticisms which have been made of the existing sinking fund system.

(TABLES FOLLOW.)

STATEMENT SHOWING THE OPERATIONS OF THE SINKING FUND FOR THE REDEMPTION OF THE CITY DEBT No. 1, FROM 1889 TO 1900 INCLUSIVE.

NOTE.—The Installments "Set Apart" under the provision of §2 of Chapter 178, Laws of 1889, were for the redemption of bonds issued after June 8, 1878. For the redemption of all other bonds payable from the redemption fund, an estimated annual installment of $1,165,000.00 would have been sufficient. Such annual installments would for the 12 years covered by this table have amounted to $13,980,000 00 leaving a net surplus of $49,284,643.13 to represent the cost to the taxpayers of the prevailing sinking fund system during this period. This "cost" would have been $111,870,403.08, had it not been for the passage of Chapter 178 of the laws of 1889. (See note number 1, page 670.)

The excessive contribution to the debt service in 1900 alone, was over five and one-half million dollars.

	Gross Funded Debt. (Former City of New York.) December 31.	Holdings of the Redemption Fund. (Excluding Cash December 31.)	Annual Bond Issues of the Funded Debt.*	Net Revenues.	Redemptions by the Redemption Fund of Bonds held by the Public.	Bonds (Payable from Sinking Fund and held by said Fund) Cancelled.	Investments in New Funded Debt Issues by the Redmption Fund.	Amount of Surplus Revenues "Set Apart" as Annual Installments under §2. Chap. 178, Laws 1889.	Excess of Revenue over Installment. "Set Apart" under §2 of Chap. 178, Laws 1889.
1889	141,943,615.42	37,360,620.50	15,541,719.96	5,542,289.68	4,181,700.00	954,900.00	3,189,235.04	975,769.02	4,566,520.66
1890	146,578,210.88	40,447,471.09	11,885,482.87	6,545,591.78	3,895,000.00	724,400.00	4,915,838.00	1,115,090 54	5,430,501.24
1891	150,327,869.73	42,269,563.94	7,609,346.85	6,731,597.15	894,200.00	2,732,900.00	4,762,180.85	1,311,146.16	5,420,450.99
1892	155,520,457 82	48,787,606.81	10,021,403.22	6,696,165 87	3,935,100.00	352,215.18	7,470,258.00	1,402,248.48	5,283,917 39
1893	167,129,323.37	56,516,762.64	12,006,099.90	7,934,313.62	2,000 00	14,500.00	7,993,690.18	1,589,549.43	6,344,764.19
1894	174,582,515.18	61,378,894,05	12,658,328.10	6,885,149.64	3,512,000.00	612,000.00	6 535,867.75	1,857,969.48	4,977,180.16
1895	186,995,507.86	62,586,404.90	16,359,126.54	6,983,773.02	1,876,300.00	951,300.00	3,450,249,93	2,039,335.55	4,944,437.47
1896	198,333,417.15	62,602,304.81	28,108,129.98	7,265,331.32	6,910,000.00	226,043.18	3,041,245.93	2,325,242.57	4,940,088.75
1897	226,079,678 79	71,987,530.86	32,001,560.50	8,211,205.99	1,244,200.00	470,537.68	10,144,464.32	2,940,470 29	5,270,735.70
1898	221,916,333.78	76,215,866.68	30,164,906.91	8,455,573.95	782,800.00	285,500.00	5,071,672.22	3,683,006.58	4,772,567.37
1899	216,402,044.96	80,642,952.74	30,308,190.68	8,325,186.44	500,000.00	3,700,688.82	8,303,653.24	3,677,512 57	4,647,673.87
1900	209,075,428.44	81,843,786.38	39,133,534.22	10,151,368.06	4,819,800.00	1,884,516 52	6,299,220.89	3,485,557.72	6,665,805.34

* Includes special revenue bonds, which, though not properly a part of the funded debt, are so treated on account of the provisions of §10, Art. VIII of the Constitution.

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COST OF GOVERNMENT IN CITY AND STATE.*

By MILO ROY MALTBIE.

The interest of the average citizen in governmental expenditures is usually slight and spasmodic. A sudden increase in taxation meets with vigorous protests from a small class—those upon whom the burden falls in first instance; invariably the number of persons so effected is small, and most of the citizens and voters manifest little interest. Few municipal campaigns have ever been won by a party whose shibboleth was retrenchment and economy, and as a permanent party cry, it has had little power.

This is due principally to two facts. In the first place, the development of a new country with valuable resources and almost unparalleled opportunities for wealth-getting have made it comparatively easy not only to earn a bare subsistence but to live luxuriously and to amass rapidly considerable wealth. Viewed from a purely business standpoint, it has been more remunerative to devote one's energies to the securing of wealth than to attempt to defend it by fighting to reduce the burdens imposed by government. The latter course yields small dividends.

In the second place, our tax systems are such as to make it appear that the burdens of government are borne by the propertied classes. They do, indeed, nominally pay the taxes levied; but in reality these are shifted, until according to the laws of incidence of taxation, the burden finally rests in most instances upon those who apparently pay no taxes but who actually do pay through increased rents and cost of commodities. Thus the workingman who knows little about shifting and incidence and who seldom stops to consider how and how far he is paying the cost of government, sees little benefit to be derived from a more economical administration but much to be gained from increased governmental

* The statistical material in this article, so far it relates to the City of New York has been furnished by Comptroller Coler. A considerable portion appeared first in *The Evening Post* of January 3d, 1901. The data relating to New York state have been compiled from the state comptroller's reports. The writer alone is responsible for the conclusions drawn from these statistics and for their present form.

expenditures, higher salaries and higher wages, which increase the demand for labor and the rewards which labor receives. Doubtless a system of taxation whereby the consumer would be made to pay taxes in first instance and whereby increased governmental expenditures would be immediately reflected in the increased price of commodities—if it were possible to devise such a system—would produce a greater interest in government finance. Indeed, the system of taxation explains to a considerable extent the intelligent interest and watchfulness which characterize the English citizen. It seems hardly probable, however, that a radical change will be made in our methods, and it is important to emphasize, therefore, that taxes are constantly being shifted and that the laboringman is the one who ought to be most interested in keeping down governmental expenditures, as upon him finally fall the heaviest burdens of government.

EFFICIENCY *vs.* COST.

In considering municipal and state finance, it is important to keep in mind that the amount expended is not the final test of governmental efficiency. One administration may spend no more, perhaps even less, than another, and yet be entirely unworthy of support, because the funds placed at its disposal are unwisely and carelessly expended. For instance, Col. Waring in 1896 spent $2,845,000 or $649,000 more than was expended by his predecessor in 1893. But no one will deny, no matter what his political affiliations, that the street cleaning department during the Reform administration was more wisely and economically administered than under the Tammany régime. Even the present administration, with all the advantages of Col. Waring's experience, does not clean the streets as well as did Col. Waring, yet it spent $3,714,500 in 1899 in the boroughs of Manhattan and the Bronx (old New York) —an increase of $870,000 in three years. It is important, however, when one is endeavoring to ascertain the success or failure of a municipal administration to ascertain whether the expenditures increased or decreased, although final decision must be determined by the efficiency or inefficiency of the administrative service.

I. CITY EXPENDITURES.

Contrasting expenditures for 1898 with those for 1900, one finds a total increase of $13,219,640 or 17 per cent in two years. In the same length of time, using the census figures of 1890 and 1900

as a basis, population increased about 6.6 per cent. The assessed valuation has kept pace with expenditures, so that the tax rate has remained nearly uniform. That this increase will continue during the present year is certain, the appropriations for 1901 being over 8.6 per cent in advance of those for 1900 and 26.5 per cent more than those for 1898.

TABLE I.—ANNUAL EXPENDITURES—NEW YORK CITY.

				Increase from 1898 to 1900.	
	1898	1899	1900	Amount	%
Mayoralty	$62,155	$63,755	$63,755	$1,600	2.5
Municipal Assembly	192,552	200,052	200,052	7,500	3.9
Borough Officers	47,312	51,300	51,300	3,988	8.4
Department of Finance	770,411	738 391	877,305	106,894	13.8
Law Department	399,758	399,758	399,758		0.0
Board of Public Improvements	173,500	249,500	246.500	73,000	42.1
Department of Highways	2,059,029	2,525.099	2,253,844	194.815	9.4
Department of Sewers	629,705	827,479	813.173	183,468	29.1
Department of Bridges	350,136	406,522	481,957	81,821	23.4
Dept. of Blds., Lighting & Sup.	3,623,110	3,785,724	3,850.937	227,827	6 3
Department of Water Supply	1,316,084	1,470,817	1,442,914	126,830	9.6
Department of Parks	1,488,070	1,781,735	1,825,113	342,043	23.1
Department of Public Charities	1,778,417	1,942,715	1,896,812	118,395	6.6
Charitable Institutions	1,710,977	1,784,846	2,857,084	1,146,107	66.9
Department of Correction	681,243	733,065	787.775	106,532	15.6
Department of Health	991,058	1,111,988	1,066.661	75,603	7.5
Police Department	11,405,644	11,884,596	11,992,503	586,859	5.1
Department of Street Cleaning	4,041,162	4,575,800	5,031,282	990,120	24 5
Fire Department	4,358,123	4,443,664	4,868,176	510,054	11.7
Department of Buildings	473,839	525,665	546,525	72,696	15.3
Dept. of Taxes & Board of Assrs.	359,600	364,900	377,150	17,550	4.9
Department of Education	12,003,681	13,040,052	14,619,111	2,615.430	21.8
City and Normal Colleges	325,000	375,000	375,000	50,000	15.4
Coroners	161,300	165,150	165,150	3,850	2.4
Commissioners of Accounts	162,864	160,000	156 000	*6,864*	*4.2*[1]
Civil Service Commission	86,000	86,000	76,000	*10,000*	*11.6*[1]
Board of City Record	415,000	515.345	535,200	120,200	28.9
Rents	267,961	326,761	315,379	47,418	17.7
For Library Purposes	181,500	215,244	214,779	33,279	18.3
Courts	931,836	967,500	966,050	34,214	3.6
Miscellaneous Expenses	1,451,548	5,105,318	668.794	*787,754*	*54.2*[1]
Total[2]	52,893,577	60,678,698	59,967,044	7,073,467	13.4
Interest, Redemption, etc.	13,981,827	23,037,095	19,284,718	5,252,891	37.6
County Budgets	10,688,927	9,809,289	11,577,209	893,282	8.3
Grand Total[2]	$77,559,332	$93,520,082	$90,778,972	$13,219,640	17.0

[1] Italics denote a Decrease.

[2] Owing to the omission of the fractional parts of a dollar in each item, the footings are greater by that much than the addition of the present figures makes them.

Table I gives the cost of each department for 1898, 1899 and 1900, the actual increase in two years and the percentage increase

using the expenditures for 1898 as the base. The unusually large expenditures in 1899 were caused by the failure to provide sufficient appropriations for 1898 and the necessity of providing sufficient funds to run the department for the next twelve months.

The lack of uniformity and the difficulty of co-ordinating the accounts of some ninety corporations from which the present city was formed, at present render impossible an accurate comparison of expenditures for the greater city prior to 1898. In five departments, having an aggregate expenditure of over $33,000,000 in 1900, or 36.3 per cent of the total budget, there was an increase of $23,377,525, or 34.5 per cent, comparing the total amounts expended for the three year periods 1895–1897 (Mayor Strong's administration) and 1898–1900 (Mayor Van Wyck's administration). Probably this rate of increase was not quite maintained in the other departments, although in a number of considerable importance such as street cleaning, parks and sewers, we are sure that the increase was as much and perhaps more. It is safe to say that the average annual cost of government is 25 per cent more under the present administration than when Col. Strong was mayor.[1] This is probably too low as it would mean that the departments other than the five mentioned would show an increase of only 20 per cent, which is undoubtedly too small as the increase in the total budget was 17 per cent from 1898 to 1900, in only *two* years. If interest payments and bond redemptions were omitted and comparisons made simply between the expenses of the administrative departments, this conclusion would not be altered, so that one can safely assert that *city government costs the citizens of New York 25 and perhaps 35 per cent more than it did four years since.*

WHO IS RESPONSIBLE?

The responsibility for this large increase is not easily located. New York city is governed from two sources, viz., the city hall and the state capitol. Special legislation is not only not forbidden, but so frequently indulged in that the legislature is as truly a governing body of the city as the municipal assembly or the board of estimate and apportionment. The statutes specify in detail the various city expenditures—the result of running to Albany for remedial legislation whenever local conditions do not

[1] The *Evening Post* estimates the increase at 30 per cent.

suit. Many of these acts are mandatory, and there is no alternative but compliance.

Thus in the budget for 1901, which amounts to $98,100,413.43, 67.55 per cent of the expenditures are mandatory—$66,270,749.10 in absolute amount—; and only 32.45 per cent—$31,829,664.33—are discretionary. *In other words, no matter who might have composed the board of estimate aud apportionment, 67 per cent of the budget could not have been other than it was, and as long as the present laws remain in force about two thirds of the city expenditures will be obligatory.* Of the remaining 32.45 per cent, nearly one-half is practically mandatory, for the performance of certain duties are specifically required by the charter or the statutes, and the expenditures cannot possibly fall below a certain amount. For example, the uniformed force of the street cleaning department must receive (under various statutes passed from 1892 to 1900, *e. g.*, L. 1892, ch. 269; L. 1894, ch. 368; L. 1897, ch. 426; L. 1899, ch. 261, etc.) at least $3,357,600, and the appropriation for 1901 was $4,994,422.27, leaving only $1,636,822.27 discretionary. *Thus when the budget for* 1901 *was passed, there were only* 17 *per cent—*$16,723,287,51*—which were really discretionary and for which the board of estimate and apportionment was truly responsible.*

Comparing the budget of 1901 with the appropriations for 1900 after transfers had been made down to December 31, 1900, one finds a net increase of $7,321,440.95, of which 81.875 per cent is mandatory and 18.125 per cent discretionary.[1] Excluding the special school fund, board of education, less than 4 per cent represents discretionary *net* increases.[2]

It is evident, therefore, inasmuch as these conditions are not new, that a large proportion of the increased cost under the Tammany régime is due to mandatory legislation enacted by the state legislature, which is and has been controlled for many years by the Republican party.[3]

[1] Of the gross increase, $7,264,362.03 was mandatory and $1,658,186.56 discretionary. Of the gross decrease, $1,270,080.22 was mandatory and $331,227.42 discretionary.

[2] The Court of Appeals has decided since the passage of the budget that the "Prevailing Rate of Wages Law" is unconstitutional which will increase the discretionary power of the local authorities, but it was valid when the budget was passed and appropriations were made on that assumption.

[3] Probably the most important recent law is the Davis law increasing the salaries of school teachers. Various estimates have been made of the amount it will add to the budget, varying from $1,500,000 to $7,000,000.

If one strives to fix the responsibility for these conditions, not attempting to say whether the increase is wise or unwise, the Tammany men point to Albany; and if the state machine is accosted, the reply is forthcoming that the city officials are so inefficient and corrupt that state interference is absolutely necessary for the public welfare. Doubtless there is some truth in this assertion, but nevertheless the state machine must assume the responsibility for its acts, and if legislation has mandatorily ordered extravagant expenditures, it is not Tammany Hall but the Republican party that is to be called to account chiefly. The reply that Democrats as well as Republicans voted for the bills is not apropos, for the latter have had the power to prevent mandatory legislation if only they so desired.

Tammany is not wholly blameless, however, for if the city authorities had strenuously objected to the legislation in question, much of it would not have been passed. As a matter of fact, Tammany has been only too glad to see expenses increased by statute, as the responsibility nominally rested upon the Republicans, and yet the increased expenditures meant larger profits to the Tammany leaders and more of its followers housed and fed by the public funds. Evidently the theory of centralized responsibility needs to be applied, not only to the organization of the city departments (*e.g.*, the substitution of a single commission for a bi-partisan board), but to the relation of the state legislature to the city. Some sort of state control is inevitable, but whatever system is worked out should in first instance place the responsibility, with power to act, upon the city, which the present system does not do. When the local authorities disregard public interests which directly concern the whole state, the state government should interfere, but only after it is plain that the city authorities are clearly at fault.

EFFECT OF CONSOLIDATION.

Probably the act of the legislature to which may be attributed more of the mandatory increase than to any other is the Greater New York charter. Prior to 1898 only a portion of the area of the present city was under municipal rule, the only important cities being New York, Brooklyn and Long Island City. The counties of Richmond and Queens got on with very simple and inexpensive administrative systems.

With the inauguration of Greater New York, much was changed. The number of city officers was considerably increased in these suburban and country districts, and the whole administrative system made more complex and expensive. The per capita expenditures for salaries in the department of health during 1897 was 15 cents in the borough of Queens, and this expense had just been increased in view of consolidation. By 1900 it had risen to 20 cents—an increase in three years of 33 per cent. The *total* per capita cost increased from 25.1 cents to over 36.3 cents—nearly 45 per cent.

In Richmond, the rise was still higher. The per capita cost for salaries, in the same department, in 1897 was 19.4 cents; in 1900, 54.9 cents—a 183 per cent increase. During the same period, the *total* per capita cost rose 157 per cent. If one compares any year prior to 1897 with 1900, the percentages approach the 300 mark. In New York and Brooklyn, the increase—per capita—for the department is less than 10 per cent.

The school expenditures show the same tendency. The percentage figures are not so large, but the increase in absolute amount is far greater because of the greater cost of maintaining the schools. In Queens, the per capita cost was $22.81 in 1896, and $34.69 in 1900—an increase of 52 per cent. In Richmond, the figures for corresponding years were $19.44 and $37.86—a 95 per cent rise. In Manhattan and the Bronx, and Brooklyn, the percentages of increase for the same period were 30 and 28 respectively.

As everyone knows, the increase in the expenditures of the department of education are largely due to legislation at Albany, but a considerable portion of the greater *relative* increase in Queens and Brooklyn is traceable to the charter.

Other departments would furnish additional evidence. The cost of the department of buildings, for example, is almost a total gain in Queens and Richmond, as the expense connected with similar functions prior to 1898 was practically nil. But if still further evidence be needed, comparison may be made between the average salaries paid prior to and since consolidation in outlying districts. Generally salaries have increased much more rapidly than in Manhattan or Brooklyn. No account has been taken of lower cost of living in Queens and Richmond, but the scale applicable to Manhattan has been extended to the country boroughs, resulting in a

marked increase in expenditures. The average salary of a member of the police department in the borough of Queens was $1,334.57 in 1900, to which figure it had been increased from $757.13 in 1896—an increase of over 76 per cent in four years. In Manhattan and the Bronx the averages for the same years were $1,377.09 and $1,271.54, an increase of less than 9 per cent.

An accurate and exact statement of the additional burden imposed by consolidation is impossible for lack of complete data. Comptroller Coler has estimated it at $15,000,000, which is probably too high if one considers merely the increase due to the Greater New York charter. Even if one were to include the annual interest charge resulting from the issuance of bonds by the local authorities in order to reach their limit of indebtedness before consolidation, it is doubtful whether the total would reach $15,000,000. This sum would practically exclude other mandatory legislation from any influence whatever, and yet we know that several millions have been added to the budget by this means. Further, in many departments we have positive evidence of increased cost traceable neither to the charter and other mandatory legislation nor to increasing population, which amounts to a few millions at least.

A third element to be noted is the general trend in all our governments towards greater per capita expenditures. Especially is this true of cities, the almost universal law being that expenditures increase more rapidly than population—the larger the city the more each person pays upon the average. Thus one would naturally expect that as New York increased in population, *per capita* cost would increase. But an increase of 25 or 35 per cent in three years is altogether too large to be explained by this law.

To summarize: Under the present administration, the annual average cost of the city government is at least 25 and perhaps 35 per cent more than under Mayor Strong. A considerable portion of this additional burden is due to mandatory legislation for which the legislature is nominally responsible, but which was winked at by Tammany Hall. Another portion is traceable to consolidation, and is the price we are paying for the realization of our desire for big things, the second largest city in the world. A third portion, much smaller in extent than either of the other two, is merely the expression of the general tendency of city expenditures to increase faster than population. There still remains, however, a not incon-

siderable sum for which Tammany extravagance and inefficiency is alone responsible—a sum well worth the efforts of every citizen to secure by electing a more efficient and economical administration. But all-in-all, the citizen is paying little more under the present than under the preceding administration. It is to be remembered, however, that *cost* is not the only factor to be considered, and that *efficiency* per unit of cost is far more important. And this is the vulnerable point in the present city government. There are too many useless and inefficient men on the pay rolls. Too much of shirking and laxity is permitted by the heads and chief officials of the departments.

II. State Expenditures.

Turning to the state government, one finds much the same tendency to increase expenditures that appears in city administration, as is shown in Table II and Table III.

TABLE II.—POPULATION, ASSESSED VALUATION AND EXPENDITURES OF NEW YORK STATE.

	1890	1900	Increase 1890 to 1900	% of Increase 1890 to 1900
Population—U. S. Census.	5,997,853	7,268,012	1,270,159	21.2
Assessed Value of Property.	$3,683,653,062	$5,461,302,752	$1,777,649,690	48.3
State Expenditures—				
Administrative Depts.....	$704,161	$2,050,155	$1,345,994	191.1
Legislative Expenses.....	581,748	1,289,900	708,152	121.7
Judiciary.....	561 999	941,045	379,046	67.4
Education.....	4,105,545	5,123,118	1,017,573	24.8
Dependent Classes.....	3,107,284	7,591,985	4,484,751	144.3
Public Works.....	4,457,599	3,994,492	*463,107*[1]	*10.4*[1]
Miscellaneous.....	1,303,894	1,917,624	613,730	47.1
Total.....	$14,822,180	$22.908,319	$8,086.139	54.5

[1] Italics denote decrease.

In the judicial and administrative departments, most of the growth has come since 1895. This is due partially to the creation of the Department of Excise and the Metropolitan Elections Bureau, but principally to the gradual yet constant increase in every department. The only one that shows a decrease from 1890 to 1900 is the Board of Arbitration.

Legislative expenses rose more rapidly in the first half of the decade, the item "printing" calling for an appropriation four times

TABLE III.—EXPENDITURES OF NEW YORK STATE.[1]

	1889–90	1894–95	1899–1900
ADMINISTRATIVE DEPARTMENTS—			
Executive Department	$35,574	$35,213	$52,712
Secretary of State	33,855	47 466	70,246
Comptroller	49.417	139,438	147,474
Treasurer	23.921	29,277	26,268
Attorney-General	61.439	44,002	172,835
State Engineer and Surveyor	17.278	28,766	76,863
Department of Public Instruction	34,302	55,093	74,517
Regents of the University	11,460	31,004	66,136
State Board of Charities	52.667	48,619	87,416
State Board of Health	26.818	63,495	41,492
Bureau of Labor Statistics	24,689	26,092	35,195
Board of Arbitration	17,837	15,461	17.748
Factory Inspector	23.877	60,354	114,662
Civil Service Commission	16.391	20,745	40,968
Com. of Fisheries, Game and Forests.[2]	82,987	110,223	154,790
Board of Claims,[3]	26.474	29,203	32,896
State Board of Tax Commissioners	8.999	9,375	63,578
Department of Excise	.....	.....	280,995
Metropolitan Elections Bureau	.....	.....	133,158
State Banking Department	21,724	32,542	91 816
State Insurance Department	83,428	144,575	187,252
Railroad Commission	52,024	54,978	81,118
LEGISLATIVE EXPENSES—			
Legislature	421,086	625,587	706.709
Printing	160,712	488 858	583,191
JUDICIARY	561,999	599,443	941,045
EDUCATION—			
State Library and Museum	54.253	71,136	100.478
Grants to Universities	84,326	56,953	130,690
Normal Schools	160,171	179,986	112,083
Indian Schools	6 716	6,204	8,209
School Grants	3.850,079	4,417,883	4,771,658
DEPENDENTS AND DELINQUENTS—			
Care of the Insane	.....	1,846,828	4,761,043
Charitable and Reformatory Institutions	2,284,710	2,430,673	2,047,830
Prisons and Penitentiaries	872,524	781,360	783,112
PUBLIC WORKS—			
Canals	3,819,098	1,464,397	2.875,625
Public Buildings	174,562	295,221	317,301
New Capitol	169,482	188,780	.....
Public Lands	19 952	82,824	11.476
Parks, Monuments and Historic Bldgs.	182,715	56,827	600,977
Rivers, Highways and Bridges	91,790	38,929	189,113
MISCELLANEOUS—			
Military Expenditures	607,330	852,727	1,006,112
Agriculture and Grants to Agr. Societies	193,821	250,523	456,491
Quarantine	215,163	125,279	66,300
Constitutional Convention	.....	67,095	.....
Miscellaneous Expenses	287,590	359.347	388,721
Total	$14,822,180	$16,256,779	$22,908,819

[1] All refunds and mere book-keeping items have been omitted from the following figures, as they do not determine the *cost* of government.

[2] In 1895, the commissioners of fisheries, the oyster protector, the game and fish protectors, and the forest commission were united into the commission of fisheries, game and forests.

[3] Present title is Court of Claims.

as large in 1895 as in 1892. This is true also for expenditures for educational purposes, but the annual growth has always been very small. The dependent and delinquent classes, taken as a unit, show an almost uniform increase.

Coming to the two remaining classes, "Public Works" and "Miscellaneous," the payments are more erratic. In 1895, $1,460,000 were spent for canals; in 1898, $7,625,000. The new capitol required $900,000 in 1898, but not a dollar in 1900. The expenditures for parks, monuments and historic buildings fluctuated between $57,000 (1895) and $1,157,000 (1898). This is accounted for by the fact that expenditures for the preceding classes are constantly recurring expenditures and must be met year by year. Those for public works are for permanent undertakings or undertakings which need not be duplicated year by year; and as little attempt is made to distribute the cost equally through a period of years, the expenditures are very irregular. However, the minima and maxima for all purposes do not fall upon the same year, and consequently the total appropriations vary only slightly.

Comparing the various classes of expenditures as summarized in Table II, it is seen at once that the greatest percentage increase has taken place in the administrative departments; state offices have been created lavishly. The next highest percentage is in the case of dependents and delinquents, which class contributes over one-half of the total increase in amount—$4,485,000. This is due entirely to the centralization of the care of the insane. Prior to 1892, this was principally a county function; the state spent little. In 1892, we find the first *large* state expenditure for asylums. Since that date, the insane have been cared for entirely by the state; several asylums have been built, equipped and maintained, and in 1900, $4,476,000 were expended, the high water mark having been reached in 1897, when $5,255,000 were spent. Certainly, in this instance, if in no other, an increased state expense has been accompanied by beneficial results, as all agree that state care of the insane is preferable to county or city administration.

The rubric having the smallest percentage of increase, saving public works, is education. The growth has just about kept pace with population, but evidently the state is not extending its activities in this direction. And if one consults Table III, he sees that grants to universities are increasing much more rapidly relatively

than grants to common schools. This suggests what is probably the strongest indictment of our state government. Executive departments have been multiplied and new offices created until the expense for this class alone is three times what it was in 1890. *Legislative expenditures have grown* 121.7 *per cent, and even the judiciary has been given an increase almost three times that alloted to education. But state aid to schools has practically remained stationary.*

Considering all of the state expenditures, taken in a lump sum, Table II shows that from 1890 to 1900 the cost of the state government rose 54.5 per cent, population 21.2 per cent and assessed valuation 48 3 per cent. Expenditures are growing nearly three times as fast as population, but only slightly faster than assessed valuation. If one could get the statistics as to actual value, it would probably be found that wealth is growing faster than government expenditures, for a larger and larger percentage of the personal property is escaping assessment.

CITY VS. STATE.

If we wish to compare the growth of the city with the state budget, it is necessary to reduce the percentage to a three year period, for it was found that from 1895–7 to 1898–1900, the city's expenses grew at least 25 per cent. Assuming that the growth has been uniform from 1890 to 1900, a decennial increase of 54.5 per cent would mean an increase of not more than 15 per cent for three years. But population and wealth have grown more rapidly in the city than in the state. Thus while the city expenditures have grown 25 or 30 per cent, population has grown about 10 per cent (Greater New York). In the state the increase in population was about 6 per cent and in expenditures 15 per cent in the same three years. *Relatively then, per capita expenditures have grown at about the same rate in city and state.*

Viewed from the standpoint of efficiency per unit of expenditures, the balance is slightly in favor of the state administration. The increased cost has not been accompanied by increased efficiency; but whereas in the city the standard has been lowered within the last three years—considering all of the departments—the state government has gone on at about the same level. There is, however, in the state as well as in the city, ample opportunity for retrenchment and economy, not so much perhaps in lopping off

this or that functionary as in seeing that whenever an expenditure is made, a proper return is secured for the people. The taxpayer and the citizen is not injured or aggrieved by high governmental expenditures, provided the return is proportionate, and essential and important functions are efficiently performed.

MUNICIPALITIES AND VICE.

A few months ago the press and pulpit of New York city started a fresh crusade against the union between the vicious classes and certain city officials and non-office-holding politicians. Two facts were established, viz., that vice was more common, more insolent and more defiant than it had been for many years; and that persons holding positions of authority under the city government were being paid for non-enforcement of law. This revival of civic righteousness hardly had gotten under way before Philadelphia, Chicago, St. Louis and even San Francisco felt the impulse, not to mention the many lesser cities whose official circles were visibly agitated because of the unwelcome attention paid to these matters. Everywhere, indeed, the problem of how to deal with vice is demanding and receiving its full share of attention.

The attempt to strangle the truth and the truth-teller is equally universal. Conditions are no worse in New York, says Mayor Van Wyck, than in Chicago, St. Louis, Philadelphia and other cities. Mayor Harrison immediately replies, in *tu quoque* style, that Chicago is not more immoral than other large cities; while every self-constituted defender of civic virtue accuses press and pulpit and conscientious citizen with defaming the untarnished name of his city, with ruining its trade and commerce, and with debasing public office. They also seem to take especial delight in recounting the vices of European cities—of Paris, of Berlin, of London. Alas, too true! For bad as is New York, or Chicago, or Philadelphia, there is more gambling and more prostitution in Paris, or Berlin, or London. But does this fact excuse the partnership which many American city officials have formed with proprietors of gambling houses and brothel keepers? Immorality may be greater in European capitals, but there is not the constant abuse of authority, the frequent resort to blackmail and the common perversion of law which so often have discredited the police forces of American cities. Piccadilly is not morally better than

the Tenderloin, but neither the politician nor the policemen of Piccadilly ever dreams of the golden elysium in which his confrères of the Tenderloin eke out a living. Now and then one hears of corruption in foreign forces, but the instances are rare and by their very novelty arouse unusual interest and comment.

Dropping for the moment the case of pot *vs.* kettle, let us come to the nub of the matter, the question: *What should be the attitude of the city government — the people acting collectively — towards vice, and principally towards prostitution?*

ATTEMPTS AT REMEDIES.

The methods of dealing with the problem show great variety. Upon the one hand, there are those cities where vice is made illegal and where it exists—theoretically—only in violation of law. This is the case in practically all English and American cities, there being only a few instances of publicly announced regulation by law. A number of American cities, however, finding it impossible to exterminate vice, have attempted to localize it by exempting from prosecution the houses located in certain sections. Some others have established a well defined system of periodic fines, it being understood that a certain sum is to be paid the city regularly or that the keeper is to be summoned into court periodically and fined, the payments going into the city treasury. In most American cities, however, the payments go elsewhere.

Upon the other hand, in many European cities vice is legally permitted to exist, but is subject to national or municipal regulation. The object of this system is to prevent the spread of disease by requiring medical inspection of prostitutes at frequent intervals, to prevent girls from beginning such a life unless fully determined so to do and of course to render abduction for immoral purposes impossible, to prevent open solicitation upon the streets or indecent exposures, to prevent boys and young men from entering brothels until fully aware of what they are doing and the results of their acts, and to make it easy for a woman to leave the life of vice when she so desires. Nearly every Continental city has regulations of this general character, although varying greatly in detail.[1]

[1] Those of Copenhagen are probably representative. They provide: (See Hale, *Police and Prison Cyclopaedia*, 1893, p. 530.)

1. Public registration of prostitutes, but no woman may register who does not have the consent of the police director, who is not 18 years of age (16 in some cases), or

Taking up the various methods in turn:

PERIODIC FINES.

The plan of summoning periodically those who profit by vice before a magistrate and of fining them a specific sum, the payment of which exempts them from prosecution for the next few weeks say, is only one degree removed from secret blackmail. There are none of the benefits of public regulation, and the only gain is the addition to the public treasury of the pittance wrung from poor, unfortunate women. Why, indeed, should the taxpayer be entitled to a share in the profits of an illegal occupation more than the policeman who patrols the district in which the occupation is carried on? If a city wishes to establish this kind of a "tax on consumption," why does it not proceed in a legal way, instead of winking at law-breaking upon being paid a few tainted dollars. Public morality must be at a low ebb in any city which will tolerate

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who is married, unless her husband refuses to live with her. At time of registration, all precautions are taken to make sure that it is a voluntary act.

2. Record is kept of the place of residence of every prostitute, and no change may be made without permission from the police.
3. All "public women" must live in public houses unless special permission is obtained from the police to live apart, which is usually permitted as long as women conduct themselves properly.
4. Prostitutes are forbidden:
    1. To appear in any indecent costume.
    2. To show indecent behavior.
    3. To follow anybody, to speak to anybody, or to make signs to anybody.
    4. To appear at the window or to remain at the door or on the sidewalks.
    5. To stand in groups or to walk to and fro in any public place.
    6. To be in a theater or other places of amusement except those permitted by the police.
    7. To sit as guests at restaurants and hotels.
    8. To extort money, although the police may be called in to enforce payment of proper charges.
    9. To appear in certain sections of the city.
5. Permission to run a brothel must be secured from the police, and the consent of the property owner must also always be obtained. Under no circumstances are brothels allowed outside of specified localities. The police may inspect at any time, and may fix the price that women pay the matron for rooms or board.
6. Medical examinations, to which all prostitutes are subject, must be made twice a week, usually by doctors appointed by the city. All women found to have a venereal disease are immediately placed in a hospital and are kept there until cured.
7. In certain sections of the city, prostitutes are forbidden to appear after 12 M. Certain places of amusement are closed to them at all hours, while in others they may occupy certain sections only. At no time may prostitutes, accompanied by their paramours, appear upon the streets or in any public place.

such iniquity—yet there are such cities in the United States. Can any one distinguish them from the old German cities, living in the moral miasma of the middle ages, which maintained their own houses of prostitution ("frauenhäuser") and profited secretly from this form of municipal trading?

LOCALIZATION.

Other cities—and this is the form of control which has most generally been adopted in American cities—have attempted to localize brothels. This is tried almost invariably not through any statute or ordinance setting apart certain districts, but by letting it be understood that all prostitutes will be arrested, fined or otherwise prosecuted who live outside of the district; and the laws are usually so strict that there are numerous opportunities for prosecution if the dislike of the authorities is aroused. Two reasons are usually given for adopting this course. One is the greater ease with which vice can be controlled when localized; the other is the less likelihood of young boys and young girls being contaminated when it is not scattered over the city. Doubtless there is much force in these arguments, but it is doubtful whether municipal control in this direction is wholly effective and desirable. It is to the advantage of certain classes of houses to localize, aside from exemption from prosecution, just as the brokers center about Wall street, the newspapers in Park Row, or the retail stores about 14th and 23rd streets. Other prostitutes find it profitable to be apart, to live in wealthy districts or in residential areas. Thus Allen street has become well known in one way and the Tenderloin in another, although there has been no attempt upon the part of the city or of the police force to localize the evil. Indeed, it would be extremely difficult to carry out completely a policy of localization, for the profits to certain classes from living in "up-town," residential districts would tempt many to disregard the threats of the police. Some would yield, but entire sequestration is impossible.

Further, it is hard to persuade men who wish to see vice stamped out that if the police can force prostitutes to live in districts set apart for them, they can not drive them out entirely. But it is true. Just as the distiller pays a small revenue tax without grumbling, but, when it mounts skyward, turns moonshiner and defies the law, so prostitutes will submit to a certain amount of

regulation, even though they know the police do not have sufficient evidence to enforce their demands. But if it were attempted to drive them out of business entirely, they would resist, as their profits are such as to justify them in so doing and in carrying on their business even under very adverse circumstances; and *controlling* public opinion, whatever its professions, *is not in favor of any such measures as would be effective toward abolishing their calling.*

Localization also involves several factors which cannot be easily dealt with. What sections should be selected? Would not the plan compel the property owners possessing buildings in the district, or districts, chosen to rent property for immoral purposes, no matter how much opposed to it they might be? Would it not be impossible to compel every prostitute to live in the areas marked off? Why should districts be selected in those portions of the city where the poorer classes live—as is usually done where the plan has been adopted—and not in the well-to-do areas? Why should the children of the poor be forced to view sights which are too vulgar and evil for the children of the rich? When Dr. Parkhurst was carrying on his crusade a few years ago, many people living up-town flew up in arms because their pure and peaceful neighborhoods were invaded by immoral women, but hardly one thought was given or had been given to those, less fortunate, who were obliged to live near dissolute men and women. What justice is there in excluding a brothel from Fifth avenue and permitting it on Stanton street?

PUBLIC REGULATION.

The Continental system of public regulation, as outlined above, has been only moderately successful even in Europe. Medical inspection—perhaps the principal characteristic of the system—does lessen, but even when enforced, does not entirely prevent it. Even with the strong police power which foreign cities possess, it is extremely difficult to enforce the requirements of universal inspection, and there are always some who will not obey, perferring to take the chance of being found out.

The provisions regarding forced detention, the intermingling in the same house of prostitutes and children, indecent exposures and public solicitation are very useful; the results are upon the whole beneficial, although there is always some evasion. Doubtless certain of these regulations could be adopted with advantage in American cities.

The Continental system is principally objectionable, as far as its application to American cities is concerned, first, because it is repugnant to our moral ideas; and second, because to embody it in law violates our social assumptions—just as to rewrite the New Testament to match our business methods would shock the religious conventions of those whose practice might be thus expressed. Every system of regulation virtually legalizes prostitution, or at least to most it would seem so. The doctrine of social expediency is not universally accepted nor its application generally known, and when an act is permitted to exist under the express or implied sanction of law, this is frequently construed to indicate public approbation. Continental standards of morality do not condemn many forms of vice that are vigorously condemned in the United States; and Continental social and religious conventions do not forbid formal acquiescence in much that is done everywhere, but which we are schooled to ignore in speech. If recourse were had to municipal regulation, it would be construed by many as an adoption of Continental ideas. Thus there would be not only a lowering of moral standards, but an increase in vice among those who at present are restrained by public disapprobation of means of indulgence that would then be given public quasi-sanction.

WHAT THE CITY SHOULD DO.

What, then, is to be done with prostitution? Is there no step which can be taken to eradicate or minimize the evil? Must the policy "hands off" be finally adopted, and must natural law be left to work out the survival of the fittest?

The first fact to be kept clearly in mind is that any system to be successful must conform to prevailing ideas—moral standards. Now there is a considerable number of persons in every community who believe that prostitution should be permitted to exist, or who will, at least, effectually defend it, either because their desires are satisfied by it or because they do not believe it proper for the city to regulate private morals. These persons comprise such a considerable and influential portion of our city populations that general sentiment, public opinion, cannot be said to favor Puritanical laws and to demand their enforcement. It would be unwise, therefore, because impracticable, to attempt to destroy prostitution root and branch. There is demand for prostitution,

and until public sentiment changes, women whose business it is to meet this demand will ply their trade.

Our experience in attempting to suppress the evil seems to support these conclusions. There frequently have been spasmodic attempts to destroy vice resulting in a temporary decrease, but more apparent than real. When the storm has passed, conditions soon become as bad as ever. It may be argued that with a police force always anxious to root out prostitution it would be possible to make permanent the status which is but temporary. This is hardly valid, for spasmodic crusades seldom suppress more than the outward manifestations, and a permanent crusade would meet with more opposition.

This experience seems to suggest the lines along which it would be best to work. There is no question but that laws regarding indecent exposures and public solicitation should be made more severe and more rigidly enforced. The sights with which little children become so familiar because always in their vision have a most deleterious effect. Immoral women should not be allowed to live in the same house with moral families. The present Tenement House Commission vividly portrays the evils of such conditions. In its report (pages 67–68) it states:

> The dangers of this situation to those of tender age in the tenement houses is alarming. We have ascertained that when dissolute women enter a tenement house their first effort is to make friends with the children. Children have been lured into their rooms where they have beheld sights from which they should be protected. Frequently these women engage one family in the tenement to do their laundry work, another to do their cooking, and still further financial arrangements are made with the housekeeper. The patronage which they can distribute is thus utilized to make friends and to purchase the silence of those who might otherwise object to their presence. The children of respectable families are often sent to the prostitutes on various errands, and because of the gifts made to the children, these women become important personages in the house and their affairs the subject of frequent conversation. The familiarity with vice, often in its most flagrant forms, possessed by very young children because of the condition just described has profoundly impressed the Commission. Several physicians have informed us that though they as children had lived in quarters where prostitution had existed, they had not possessed a tenth of the knowledge of it which they find almost universal among tenement house children of the present day. The anxiety of reputable parents living in houses upon which these harlots have descended is, most pitiful. One of our charity workers stated that she had heard women living in tenement houses thus infected bemoan the birth of a daughter because of their fear of the dangers to which she would be exposed. And the same worker declared that scarcely a day passed that some women did not confide to her a mother's anxiety and despair regarding this situation.
>
> But it is not the children alone who are contaminated! Boys and young men liv-

ing in the tenement houses are tempted, and become addicted to habits of immorality, because of the constant temptation placed before them almost at the door of their home. Still more distressing is the condition of young girls. Such girls are often working in difficult situations with long hours, small pay and hard work. When they return to their homes tired and perhaps discouraged at the end of the day's toil, they see their neighbors living lives of apparent ease, dressing far better than they can afford to dress on their limited wages, and showing by their manner that they feel themselves superior to those who are foolish enough to toil when they might be at leisure. The very sight of this contrast with their own condition raises despairing questions, disappointments and bitterness. After the shock occasioned by the knowledge of the character of the prostitutes has subsided, as it inevitably will, if the evil is encountered daily, the girls are led to consider seriously the words of the tempters. The fall of many girls, the daughters of honest and reputable parents, has, undoubtedly, been due to this contamination. From the statement of many in a position to know facts, we have been led to believe that more girls have been started in recent years, upon a life of immorality, because of their associations in the tenement houses, than by all other means combined that supply this traffic."

As a remedy, the Commission advised that tenement houses, any part of which is used as a house of prostitution, be subjected to a fine of $1,000, the fine to be a lien upon the premises; that such use be presumptive evidence that it is with the knowledge and consent of the owner or lessee, which may be rebutted by appropriate evidence; and that women using a tenement for immoral purposes be punished by imprisonment and not by fine. This recommendation is very mild, and ought to meet with general support.

But the phase which most deeply concerns every father and mother is the protection to be given to young girls. The temptations which beset them are often greater than they can bear, and if they were shielded until twenty-one years of age they would be able to fight their own battles. Possibly it would be wise to provide by statute and police ordinance for fine and imprisonment of any woman under twenty-one years of age who is given to prostitution, of the keeper of the brothel in which she is, and of the man customer concerned. To facilitate the enforcement of this regulation, every prostitute might be required to show upon application a card containing her photograph and residence, and a statement signed by the proper authority certifying that she was over twenty-one years of age, and that she reported regularly her desire to remain a common woman. These provisions would not only protect the girls, but the boys as well; for women over twenty-one would attract them but slightly, and the cost would exclude a considerable number whose "quarters" now

carry them where dollars would then not reach. If only the young boys and girls could be kept from prostitution, the worst and most lamentable features of the whole question would be removed. There is no sadder picture than a young girl selling her body, or a young boy purchasing it, before he or she has become fully aware of the consequences of such an act.

The further general policy of the city as expressed in laws and ordinances should be the suppression of all external evidences of prostitution. Public opinion would support such action, whereas tit will no uphold any attempt to prevent illicit cohabitation *per se*. This work must be aided by factors other than the city government, *i. e.*, religious organizations, churches, settlements, parish houses, etc.

The principal trouble at present is not so much with the laws and ordinances, though they are probably too strict for public sentiment, but with their enforcement, which is too lax and too often made a means for levying blackmail. Doubtless law-breaking has been winked at so long that rigid enforcement would meet with vigorous protests, but an efficient police force, determined to prevent the public flaunting of immorality and its contaminating influence could do away with the worst social effects of prostitution.

The writer is far from proposing, however, that this or any system is sure to succeed or certain to produce desirable results. To assert this would require far more study and scientific inquiry than has been given the subject. Although complete investigation is urgently needed, the problem is complicated by social, religious and legal factors that baffle calculation and mislead logic.

We are, however, not without many precedents. Greece and Rome tolerated what we brand as the "social evil" as a development of recognized nature worship; and dealing with it from the standpoint of public order, each successfully solved the problem it faced. In the East, from the time of Abraham to the typical moslem community of to-day, a social system has prevailed which has so fully recognized and completely dealt with the motives of prostitution as to minimize the miseries we have produced by damming up natural impulses. And Japan by an entirely different method has almost completely protected her women from the social, moral and physical suffering that is the most terrible of the ills we deplore. Trained hetairai, registered and togad meretrices, polygamy and concubinage, or the treatment of prostitution as a

hard but not dishonorable calling which leaves no stain upon her who has left it, may each be intolerable from our standpoint. But one need advocate neither to argue that we, who have attempted all that others have ventured and have failed in every direction in which they succeeded, may yet learn somewhat from the experience of those who better measured their ability. The most stubborn factor to-day is the same with which they had to deal—human nature. It may be that they conceded too much to it. That criticism, however, will come with better grace from us when we shall have the frankness to face—instead of to ignore—the constant facts with which we have to deal; when we shall have scored even the limited success that they achieved; when we shall have learned by heart the one condition that all history has shown must never be forgotten.

Naturam expellas furca, tamen recurret.

THE CITY'S CIVIL SERVICE.

By George McAneny.

The classification of the civil service in New York city, under the present law and rules, embraces every officer and employee who is paid a salary or wages from the city treasury, except those who are elective, heads of departments, principals and teachers in the public schools—who are subject to a separate system—and the subordinates of the municipal assembly. Beyond these general cases, no appointment may be made except in the manner prescribed by the civil service rules, and the comptroller is forbidden to pay the salary of any person whose appointment in such manner has not been formally certified by the Civil Service Commission. Any sums so paid may be recovered from the comptroller personally, through a taxpayer's action, and returned to the treasury.

I cite these facts, by way of introduction to a brief sketch of the service as it is, to show how universally the law applies and how absolutely it may be enforced when its administrators believe in it and mean to enforce it. It is peculiar to the merit system, however, that its administrators are not merely the civil service commissioners—whose powers are large—but many whose duties are perfunctory. They include, in an important sense, every executive head in the city government, and chief among them the mayor.

While there are some exceptions, it cannot be said that there has been either sympathy with the purposes of the law or much evidence of intention to give them effect, under the present régime. Very shortly after his inauguration, Mayor Van Wyck was reported to have declared that as the people had very plainly pronounced "against this civil service reform" in the late election, he would see to it that there should be very little of it, forgetful, perhaps, that the constitution of the state which he had just sworn solemnly to support required that the principles on which the reform is based should be recognized in every appointment that either he or his

assistants might make. If the mayor was reported correctly he has been faithful to his professions if not to the constitution, for the effort to secure a proper enforcement of the law during the past three years has met with constant and very frank resistance. That the system has in some measure been upheld and that here and there it has produced good results, may be attributed on the one hand to the generally favorable action of the courts in the long series of cases brought to compel the adoption of proper rules and gradings, and, on the other, to the continuance by the civil service commission of an efficient and faithful board of examiners.

CLASSIFICATION OF EMPLOYEES.

The system as now established is in itself a good one—superior in many ways to that in operation under the earlier civil service act of 1883—but there are still defects and drawbacks to its smooth working. Under the rules the service is arranged in three divisions. In the first of these, "Schedule A," are those positions excepted from examination, which should properly be confined to principal deputies, private secretaries and the highest professional officers, but which still include many other places of subordinate rank, where exceptions are based commonly on the "confidential" or "fiduciary" relations of the employee to his superior. Positions in this class are for all practical purposes on a par with those in the unclassified service. They are filled through the arbitrary selections of the appointing officer, and in most cases those holding them may be removed, as well, at pleasure. There are about 600 now on this footing. The second class, composed of Schedules B to F inclusive, contains the positions subject to competitive examination, all clerical places that are not excepted, the uniformed forces of the police and fire departments, engineering and other technical positions and the great variety of miscellaneous positions—numbering more than two hundred titles—above the grade of laborer. The total of these is approximately 20,000. In the third class are laborers and mechanics, employed under ninety-seven titles and composing a force ranging from 10,000 to 15,000, according to the season of the year. These are selected through the registration system, in which there are no written tests, but where proofs of fitness for work and of physical capacity are required, and employment is given on the principle of "first come, first served."

RESPONSIBILITY FOR MALADMINISTRATION.

That the character of the work of each department and the nature of its results must depend on the fitness and efficiency of its individual members from the highest down, is, of course, a proposition too trite to call for any elaboration. That "politics" should be kept out of municipal work, and that the organization of the public service should have no inter-relation—or, for that matter, no relation of any sort—with the organization of a non-official political society, are propositions equally trite. The civil service rules, through the two principal methods they prescribe for original selection—written competition or registration, supplemented in each case by inquiries as to personal character, in advance of examination and appointment, and by probationary trial after—are designed to secure exactly these ends. There is no reason why, if correctly administered, they should not secure them. The examinations may be framed to fit virtually any case. They may be as practical and as searching as the examiners choose to make them, and where they fail to disclose any serious disqualification on the part of the applicant, the probation, which is required in every case before an appointment, and which in New York city is fixed at three months, is fairly certain to do so. If the service beyond the date of permanent appointment is unsatisfactory, there is the remedy of removal or of reduction in grade, and to justify this the department head is required merely to file his reasons in writing, and if the person concerned is accused of dereliction to give him a fair opportunity to make an explanation. No employee has the right to a trial or formal hearing, so far as the civil service rules are concerned; the popular notion that this is the case is erroneous. It is the theory of the lawt hat the higher posts in the service shall be filled by the promotion of those who have proved their fitness by actual trial in the lower. Where the position to be filled is peculiar, and not one of a class from which promotions might be made, exceptions to this rule are contemplated, such positions being thrown open to public competition just as those in the lower classified grades are supposed to be.

The departures from the practice just outlined mark the most conspicuous failures in particular branches of the municipal government. If clerical work is poorly done and those parts of the system of municipal business on the working of which the smooth conduct of private business so often depends fail to

respond, or to keep up with the outside pace, something is radically wrong with the method through which the clerks were selected or with the discipline of their superiors; if the streets are filthy and the first principles of sanitation neglected, it is not only the head of the force but the force itself whose incompetency is to blame, "pull" has taken the place of merit in its organization, and the sort of spirit that is turned into energy is lacking. If the police are corrupt, and the higher offices are worth a great deal more than they ought to be to those who hold them, it is very largely because promotions are manipulated, and because those whose claims are based on superior service are set aside for those whose influence, no matter of what sort, is strong enough to move the appointing powers to give them preferment. If charitable or reformatory institutions are mismanaged, if the development of the parks is retarded, or if the inspection of public works or the regulation of private building is unintelligent and unreliable, the main cause will always be found in the neglect or violation of either the principles or the terms of the civil service law. Moreover, while inefficiency in itself breeds extravagance, the fact that positions may be filled without compliance with fixed rules, and at the unrestricted will of the department head, leads inevitably to the multiplication of offices in excess of the real needs of the service, in order to meet a demand that far exceeds what, on an honest basis, would make up the natural supply. Under such circumstances, with employees introduced through "politics" and depending for advancement and retention alike on the political powers behind them and not on merit, no influence can be more detrimental to proper discipline or more generally demoralizing.

BAD CONDITIONS UNDER THE PRESENT ADMINISTRATION.

The civil service statutes applying to New York city at the date of the consolidation were amply sufficient to provide a basis for the establishment of a system on correct lines, and to prevent the abuses attending the patronage system. Prior to January 1, 1898, the so-called "Black act" had been in force in the state and in all of the cities, though in New York, under Mayor Strong, it had been rendered nugatory by the action of the heads of departments in continuing the civil service commission in undivided control of the examinations. The new charter contained several sections regarding the civil service, based on the act of 1883 which the

"Black act" had modified, and the enactment of which indirectly but absolutely repealed the latter highly objectionable measure, in so far as it applied to the city. These sections gave the mayor authority to appoint a civil service commission of three members, and the commission was directed to prepare rules for his approval. Under other provisions of the charter the rules of the former New York city commission were meanwhile continued in operation, applying to the whole consolidated territory, until the new rules might be framed. The former commissions, for New York, Brooklyn and Long Island city, were naturally discontinued.

The old rules were very satisfactorily framed. Their provisions with regard to removals were, however, disregarded from the beginning, and to fill the vacancies, as well as the numerous new positions that were created, many hundreds were appointed without examination, under "temporary" certificates, but without limit of time.

On March 5, the rules of Mayor Van Wyck's Commission were presented to the mayor and signed by him. They were, from the point of view of the civil service reformer, seriously defective, materially increasing the "excepted" list, continuing authority to make indefinite temporary appointments under any title the appointing officer might elect, broadening the scope of selection from the eligible lists, and removing the competitive feature of the labor registration system, thus effectually restoring that important branch to the class of "spoils." It was contended by the city authorities that these rules did not require the approval of the state commission to take effect, as the general law required in the case ofall cities, and that, in fact, the charter provisions constituted so complete a civil service system in themselves that they wholly superseded the general law. The Civil Service Reform Association took the opposite position and maintained that, while the Black modifications had been repealed, the provision requiring the ratification of rules by the state board, as well as all other non-repugnant parts of the general law, remained in effect. Months afterward the Association won its point in the courts, but not until a great deal of damage had been done.

A new act was passed March 31, emphasizing the requirement for approval by the state board and re-enacting the rule regulating removals. Under this law all new appointments under the municipal commission were challenged, and salaries were with-

held by the comptroller until the corporation counsel gave an opinion to the effect that the new act had no effect on the situation and that the contested rules were regularly in force. From time to time, as these questions were raised, the commission suspended its examinations, but the removals, the "temporary" appointments, and the use of the labor force as a means for smuggling unexamined persons into competitive positions, continued without interruption. Finally, the Civil Service Reform Association won again in the Court of Appeals, the opinion of the corporation counsel was set aside, and the irregularity of the mayor's rules was definitely established. At about the same time, however, the general civil service law of 1899 was passed, and an even more radical reconstruction of the system was required.

The new law, commonly known as the "White act," was signed on April 19. During 1898, however, with all of the "re-organization" attending the accession of Tammany, there had been only 500 appointments from competitive eligible lists, while 900 had been made to excepted positions, 1600 under temporary certificates, and 6,500 through the labor bureau.

The new law allowed the mayor sixty days to prescribe rules and to send these to the state board. It provided that in the event of the failure of the mayor so to do, the state board might itself prescribe the rules. The rules when presented for approval were but slightly changed from those framed under the charter, and were not accepted. After a conference, the state and municipal boards then agreed on a code somewhat in the nature of a compromise, but very much in the direction of improvement. This the mayor refused to sign. The state board on July 11 then adopted a wholly new code, which, with certain subsequent amendments, is still in effect to-day.

It will be seen that, working under such odds and with struggles to defeat the law constantly carried on, the merit system had little opportunity to produce good results during the first year and a half. The examinations where held were well devised and satisfactorily conducted, an item which, under normal circumstances, would be of immense value, but as the heads of departments succeeded so well in getting their men through the several "back-doors" within their reach, the calls on the examiners for men whose appointment really represented the fair operation of the law were relatively few.

Since the latter part of 1899, the results have been somewhat better and the proportion of competitive appointments has increased. The means of evasion most commonly used have been done away with, and though various new ones have appeared they are not so easy of execution, and are employed on a smaller scale. The appointments of policemen and firemen have, to all appearances, been relatively free from political interference; and from among several thousand applicants an excellent class of men has been secured; the advancement of men within the departments is another story. Many of the appointees to engineering positions are also of a very superior order. It is in these two classes, however, that the best results have been secured. In the others, for the most part, the good results have almost invariably been minimized by the hampering conditions that still remain.

The Civil Service Reform Association has been obliged to take numerous minor questions to the courts through test cases, and it has suggested further changes in the rules both to the state and municipal commissions, as it has from time to time believed them necessary. As a result of the gradual improvement in the system, brought about through these various agencies, there is, as I have said, at least a better situation. The gains made, and the difficulties still existing, may be summarized somewhat as follows:

(I). The "excepted" class has been reduced materially, and, while under the charter rules an unlimited number of appointments were allowed under an excepted title—a practice that often led to the filling in this manner of positions actually competitive—the number is now fixed in each case in the rules. But the exceptions that remain are far too numerous. In the comptroller's department alone there are 111 out of a total of 659 employees. In the treasury department at Washington there are scarcely half a dozen. The statute itself exempts those deputies who are authorized by law to take the place of their principals, secretaries of departments and commissions, and clerks of courts, or of elective judges. Exceptions beyond these classes are left, in the first instance, to the discretion of the commission. The majority of them are based on the argument that an employee whose duties have to do with the receipt or custody of public moneys should be chosen solely by the superior who is "responsible for his acts." The law, however, expressly permits the exaction of an

adequate bond as a condition of appointment in such cases, and there is no reason to suppose that a candidate who has proved his merits in an examination will be any less able to furnish such a bond than one who has not. In the federal service bonded employees have for years been selected through examination with perfectly satisfactory results. The exceptions in the city are, however, by no means confined to this class. They are demanded by appointing officers on all sorts of specious grounds and far too frequently have been granted, By way of instance I may mention four positions excepted by the municipal commission, with the approval of the state board, in November, 1899.

The first of these was an "additional superintendent of parks," to permit of some shifting of the persons already employed under that title. Strict, technical examinations would have secured the services of a landscape gardener or expert—for the salaries paid are high, ranging from $2,700 to $3,000. Under the previous exemption, however, the office of superintendent for the Bronx, with its great park system, had been filled by the appointment of a saloon-keeper. The position of "superintendent of small parks," which had taken the place of that of superintendent of the aquarium, had been filled under Mayor Strong by Dr. Tarleton Bean, late of the Smithsonian Institution, and one of the first ichthyologists of the country, who had virtually made the aquarium. Dr. Bean was removed, under the exemption, and in his place was put a member of Tammany Hall, whose chief claim for preferment seemed to be that he had fished in various streams with Richard Croker.

The second was an "auctioneer's process server" in the office of the president of the council. The position of all other process servers is competitive. There was no conceivable reason founded in good sense for treating this one differently. The appointee was a barber, who, it transpires, had been accustomed to shave the president of the council in private life, and who had previously held a temporary appointment, under a different title, from which he had been ousted.

The third was a "custodian of records" in the health department. If, as this title implies, the person appointed was to have anything to do with the keeping of the department's records, there would be a curious inconsistency for the reason that from the head of the bureau down all other employees are competitive. What-

ever the reason for the exemption, however, it appears that the person appointed was a Tammany member of the board of aldermen of 1898, who had failed of re-election for the year following.

The fourth was a "clerk's attendant" in the city court. All other attendants are in the competitive schedule, and there was no valid ground for the exemption of this one. The appointee proved to be a person who had previously served as an attendant under a "temporary appointment," which, after running for a year and five months, had been cancelled; a man who having gone into the competitive examination for permanent appointment stood eighty-ninth on the eligible list, and could not, therefore be reached in a regular way.

How far exceptions from the examination or promotion rules may legitimately be carried is a matter concerning which there are differences of opinion. Few who believe in the merit system will maintain, however, that they are appropriate in the case of a half or a third of the places still remaining on the excepted list in New York. As experience has abundantly shown, "exceptions" are in most cases mere concessions to the spoils system; so many "places," left free for the purposes of machine politics.

(II). The competitive list has been increased in inverse proportion to the reduction of the excepted list, and all examinations are required to be publicly advertised. Such advertisements are generally confined, however, to the *City Record*, and as yet are copied as news announcements by only a few of the daily papers.

(III). The labor registration system, set aside under the charter rules, has largely been re-established. Under the terms of the rules, all applicants in this class are required to satisfy the examiners that they possess the necessary capacity for service in their trades, and all must pass a physical examination. The lists are sub-divided under the various trade titles, and selections for appointment from each are based on priority in application. The practice of examining craftsmen in the actual use of their tools, established by Mayor Strong's commission with the aid of the New York trade schools, has been continued in modified form, but a second sub-division of lists, according to boroughs, has made it easier to reach particular names by lessening the number on each.

The abuse of appointing persons through the labor bureau, who are destined for competitive work, also continues. How far it extends no one can tell.

(IV). For appointments in the competitive class three names are certified for each vacancy, in accordance with the recent decision of the Court of Appeals, but the rules have been amended to require that the two persons in each certification who are not selected shall be returned to the eligible list for recertification for the next vacancy, except that one person may not be certified more than three times to the same appointing officer.

(V). Selections are required to be made from the most appropriate list, instead of permitting a new examination, under any title a department officer may designate, for each appointment. Under the charter rules an appointing officer could ignore an existing eligible list by simply dubbing the position with a new title, and making a temporary appointment until a new list might be formed. There are cases in which after such an appointment had been made and a list created, at more or less expense to the city, the temporary appointee was discharged, and immediately reappointed temporarily under a second new title, and so continued. At present new lists may be formed only when it appears that the existing lists contain the names of none who are properly qualified for the particular kind of work to be performed, without reference to the title that may be employed.

(VI). Temporary appointments in the absence of appropriate lists may now be made only after non-competitive examination, and then for a period not to exceed thirty days. Successive temporary appointments to the same position are forbidden. When the rules framed under the White law took effect, on July 11, 1899, there were scores of these that had been continued for a year and a half, and on August 10, when, under the thirty-day clause, it was required that all remaining should be cancelled, more than four hundred were still found on the rolls.

(VII). The requirements that promotions shall be on a competitive basis is more strict. Each department is expected to keep service records, showing the conduct and efficiency of each employee, on which the principal part of the rating for promotion will be based. It is further provided that all increases of salary higher than the limit fixed for the particular grade, shall be considered as promotions, and that none of these shall be allowed without an examination. The promotion system is, however, as yet very incomplete. The service is not properly graded; there is no uniformity in the distribution of work or in the salaries paid,

and it is very difficult to form a class of persons on an equal basis, for promotion examination, within the meaning of the law. This does not apply in the police and fire departments, where the grades are absolute, but in the former at least, such promotions as have recently been made are of very questionable regularity in view of the fact that the actual records of the men were not properly followed, and that the ratings were fixed according to the arbitrary judgment of the appointing officer.

(VIII). Persons appointed from competitive eligible lists for probationary terms have been secured in their positions for the whole length of such terms. Under the previous rules a "probation" had been construed to mean a period any time during which, even on the day following the appointment, a removal might arbitrarily be made. The rules have been amended so as to permit arbitrary removal only at the end of the term, the retention of the probationer beyond such time constituting a permanent appointment.

(IX). Department officers are forbidden to appoint or assign any person to perform the duties of a position not properly described by its title, and in sending their pay-rolls to the commission for audit, they are required to give a certificate to the effect that all the titles they contain are correct. There is, however, abundant evidence to show that this rule is violated with impunity. The practice of smuggling, through the labor schedule and through other means, continues to be one of the most serious with which those who are endeavoring to defeat evasions of the law have to deal.

(X). The municipal civil service commission is required to keep a permanent roster of all persons in the classified service, giving the title and character of the office held, the date of commencement of service, the amount of salary, and other pertinent data. There is, however, a deplorable dearth of official statistics bearing on the municipal service. Under a statute of 1900 it is required that a roster shall also be printed semi-annually in the *City Record*, giving various information, but as this is not tabulated or totalized in any way, and is a mere mass of indigestible material, of no service to any one who has not the patience to devote his time to making compilations of his own. The commission has, however, a very fair card system, which enables it to examine pay-rolls accurately and expeditiously, and the check upon payments to

persons whose appointments are not at least nominally regular, is a very valuable one.

(XI). The rule requiring all officers having the authority to remove subordinates to state their reasons for so doing in each case is renewed and strengthened. Under a recent judicial decision, statutory officers, that is, those whose positions are established under statutory titles, are excepted from this protection. The number of these is not great. During the earlier part of the present administration many hundreds of removals were made, notwithstanding the fact that at all times there has been some such rule as this in force, but, owing to the contentions following the passage of successive legislative acts, and the contest of rules in the courts, very few of these, comparatively, were successfully challenged. The practice of "abolishing" positions, and of re-establishing them shortly afterward with other persons in them, was also a very prevalent one, although here the courts have interfered in many cases, and have given rulings that will make the plan very difficult of execution in the future.

The general system, through which such appointments as come, in one way or another, within the control of Tammany Hall, is too well known to require very elaborate explanation. The heads of the city departments are almost without exception members of the Tammany general committee, "district leaders," or members of the Democratic organizations of the other boroughs. One of the principal functions of a district leader is to secure places for the elect among his constituents. An "organization" man at the head of a department usually requires the endorsement of this functionary as a condition of appointment to any post, and promotions are made or salaries raised very largely on the same sort of recommendation. Something like a fixed apportionment among districts is fairly well carried out, and, so far as practicable, each appointment is made to tell in advancing the interests of Tammany at election time. The civil service rules have blocked the operation of this system in some places, and made it difficult in others, but with the long and uneven contest for a correct system at the beginning, and the manifold means of evasion discovered by those interested in defeating their objects, they have been ineffective in by far the major proportion of cases. They have certainly had very little chance to produce the sort of results they are intended to produce. If the system had properly been carried out

—comprehending as it does not merely practical competitive tests for appointment, but the filling of the higher posts by those best fitted through training and experience in the lower, retention made dependant on efficiency and faithful service alone, and the exclusion of political influence at each point—the development of each department to meet its requirements as part of a business organization and the general improvement of municipal conditions would be advanced immeasurably. The experience of New York under the present administration is, in brief, an object lesson for civil service reform from whichever point of view it may be regarded.

CITY CLEANSING IN NEW YORK:

SOME ADVANCES AND RETREATS.

By Charles A. Meade.

The Street Cleaning Department of New York is a bureau very inadequately named. It is very much more than an organization for sweeping streets and removing litter therefrom, which work constitutes but a portion of its labors, since it collects and disposes of all the refuse from the process of living which is not cared for by the sewers. The name, department of city cleansing, would be a very much better one.

EARLY CONDITIONS.

The street cleaning department as a district bureau of the city's public work was created by an act of the legislature in 1881, and is to-day operating under the reorganization effected by the act of 1892, which was the result of an investigation by a commission appointed in 1891 by Mayor Grant. This measure, which is Chapter 269 of the Laws of 1892, has proved to have been exceedingly well conceived—so well, in fact, that later commissions concerned with the operation of the city government have attempted to recommend little or no change in the act.

Beneficent as the act of 1892 was and broad-guaged as were the recommendations of Mayor Grant's committee in 1891, the public derived but little benefit therefrom until the year 1895. The reason for this was the continuance of the same system of employing labor which Commissioner Beattie in 1891 frankly explained in his testimony before the Fassett investigating committee, and which Mayor Grant's committee referred to as still being in existence and described it in the following words :

> Briefly stated, that system is this : The department has, measurably speaking, little or nothing to do with the selection of its own employees. They are "appointed and removed principally at the whim of persons" (unconnected with the department) "making requests to that effect." They are selected "without reference to their ability to do the given work for which they are employed, and are liable to discharge without good business reasons therefor."

The results of such a system would be evident to any thoughtful person without the additional necessity of experimental proof which the public seemed to have desired.

The recommendations of Mayor Grant's committee resulted first of all in the increasing of appropriations which had up to 1891 been miserably inadequate. In 1894, the last year of the commissionership of William S. Andrews, the street cleaning department expended in round numbers $2,370,000, and it may fairly be said that the conditions were but little better than when Commissioner Beattie emphatically testified as to the unsatisfactory state of affairs in 1891.

COL. WARING MADE COMMISSIONER.

The first positive move ahead was made in 1895 when the management of the department came under the late Col. Geo. E. Waring, Jr. Both Commissioner Andrews and Commissioner Beattie had attempted to put into execution some excellent plans for the development and betterment of the work, but these were more or less ineffective on account of the "'whim of persons' (unconnected with the department)" to which I have already referred.

Accepting pretty freely the recommendations of Mayor Grant's committee, the work of sweeping was organized and developed by the infusion of thorough and admirable discipline into the large corps of hand-broom sweepers, who were employed solely with regard to their capacity and sobriety. Col. Waring, in his book, "Street Cleaning and Its Effects," very forcibly tells of his relations with the employees of the department and their former sponsors, the politicians. Extreme difficulty was experienced at the start in convincing not only the employees themselves, but the politicians also, that no appointments would be made unless candidates showed capacity for work, and that none would be dismissed except for incapacity. That the promise was a true one, no politician in New York will deny to-day. That the rigid adherence to this policy lent strength to Tammany Hall in the municipal campaign of 1897, there is not much doubt, as it is certain that that organization had a considerably larger number of street cleaning department employees enrolled in its membership than had any other political body. This was due to the fact that Commissioner Waring, from the time that he assumed office until his term expired, had dismissed no one for his political affiliations and had

appointed workmen as willingly for Tammany Hall as for Republican politicians, provided the men were right. It is, however, interesting to note that, after a few months of trial as to the adaptability and capability of various men already in the department, and of others induced to take up the work, Col. Waring filled the majority of the superior places of trust and responsibility with men, generally young, who, whatever might be their attitudes concerning national politics, had no affiliations with municipal politicians of any kind.

IMMEDIATE IMPROVEMENT.

Under Col. Waring's administration, the first great step was probably that of enforcing the law, long a dead letter, which forbade the standing of unharnessed vehicles upon the street, and which made it incumbent upon the commissioner of street cleaning to remove all such incumbrances, which might afterwards be released to the owners upon the payment of a fine. These fines amounted to a handsome sum in 1895, but fell the succeeding year to a nominal amount, when truck owners and drivers finally realized that vehicles seized could be regained only by payment of a fine, and not by the intercession of the political leader.

This work was followed by the raising of the force, sweepers and drivers, from being a laughing stock to a body of honored workmen. The change was effected in a remarkably short time, and was accomplished by the simple but effective expedient of bringing the public servant into the public's field of vision by means of the white uniform, and by the continuous insistence of a quality of work as immaculate as the uniform. At a later day, this was followed by a master stroke in the establishment of the Committee of Forty-one and the Board of Conference, an automatic means of settling, by the men themselves, the complaints and grievances bound to arise in the administration of a large body of workmen, which has probably never been surpassed, if equalled, in this or any other country.[1]

While the work of street cleaning and refuse collection and disposal were being carried on by the means nearest at hand and in the best fashion available with those means, expedients were continually on trial for the improvement of the quality of the

[1] For an account of this feature and its results, see MUNICIPAL AFFAIRS September, 1897.

work and the possible reduction of expense. The idea was always kept firmly in mind that the question was entirely a sanitary one, and that within reasonable limits the sanitary point of view was to take precedence over that of economy, as far as mere expenditure of appropriation was concerned. The expenditure, therefore, in 1895, of $2,780,000 in round numbers as against the $2,370,000 already referred to as spent in 1894, will never be considered by those familiar with conditions at the end of each of those years as an increase comparable with the results attained.

STREET SWEEPING.

The effort of Col. Waring to achieve as complete street cleanliness as possible resulted in the introduction of the system of bagging street sweepings as soon as picked up by the sweeper, thus preventing the redistribution of the street dirt, before it could be removed in carts, by the wind or passing vehicles. This plan made possible economy in sweeping, but the economy was well applied not in reducing the number of workmen, but in the insistence of a higher standard of street cleanliness. It became necessary in 1898 to abandon the use of these bags on account of the difficulty and cost of cleansing them and the impracticability of destroying a new bag with its initial contents. (A bag costs from three and one-half to four cents, and the daily collection of street sweepings in Manhattan and Bronx, old New York, is from 25,000 to 30,000 bagfuls). The principle was retained however in the use of a can on the same carrier as that used for the bags. The can is not as effective as the bag in the prevention of dirt redistribution, since it is open at the top and must be emptied into the collecting vehicle, and not removed entire as the bag was; but it does fairly well and costs much less than a daily consumption of 25,000 jute bags would amount to, or their proper cleansing.

The provision of "section-stations," rooms where sweepers could report for duty and where their tools and uniforms could be stored at night, was attempted first by Commissioner Beattie and helped on somewhat by Commissioner Andrews. In 1895 and 1896, the system was completed for the entire city (now the Boroughs of Manhattan and the Bronx), and proved an immense aid to the administrative work of the department.

STREET SPRINKLING.

The work of street sweeping in New York in summer time has been for a number of years and still is greatly hampered by the existence of a private corporation called the Street Sprinkling Association of New York. By section 337 of the old consolidation act, as amended, the commissioner of public works of New York city was given the right to grant for a period, not to exceed ten years, a license or privilege for the use of the city water for the purpose of sprinkling the city's streets, "subject to reasonable regulation." As can be guessed, the "license or privilege" was secured for not less than ten years. The association makes its money by sprinkling those streets whose residents or business houses subscribe for the work. The result is that the work of street sprinkling is not done in conjunction with the work of street cleaning, and more than frequently is a source of annoyance and hindrance to the work, when it should be a great aid. When the time for the present company's privilege expires, it will be incumbent on the then commissioner of street cleaning to secure for his department the rights in this matter which always should have belonged to it.

REMOVAL OF ASHES.

In 1896, Col. Waring conducted a number of experiments in the direction of improving the method of ash removal. The emptying of the ash can, by even a careful cartman on a windy day, has probably been as productive of complaints in the newspapers, from citizens who believe from a single observation, that the work of city cleaning is poorly done, as any one thing in the entire work. Too many obstacles prevented the maturing of any plan which could be followed by the city authorities. The chief difficulty lay in the hostility of domestics towards any method which increased their work in the caring for ashes inside the house. At the present time nothing is being done for dust prevention in this branch of the work of city cleaning, and the process of can-emptying into the collecting carts when the cartmen are allowed to do their work in a slovenly manner is productive of the greatest nuisance.

SNOW REMOVAL.

One of the most beneficent things done under Commissioner Waring's leadership was the change in the system of snow re-

moval. Up to 1896, whenever enough snow fell to make necessary its removal, the department used its own carts and men, supplemented by an ill-organized system of extra carts and men hired for the time being. The result was that the usual and extremely necessary work of the daily removal of house wastes was neglected; and the system of hiring men outside of the department was so utterly inadequate that comparatively little snow was removed. Col. Waring's plan of having this work done by contract, so arranged that the number of streets cleaned of snow was limited only by the amount of money it was deemed advisable to spend, while the regular force of department cartmen suffered no interruption in its routine work and the sweepers were most advantageously employed in keeping clean crossings and gutters, worked most admirably, as the records of the work done in the winters of 1895–96 and 1896–97 and the testimony of witnesses can show.

The competition for this work of snow removal led, in 1898–99 and 1899–1900, to a large reduction in the price bid for the work (this does not mean that the cost per unit of snow removed was necessarily reduced), and this reduction in the amount bid has at times been used as an excuse for various failures to perform this work as well as it ought to have been done. Examination of the snow removal contracts will show that the city's interests in the matter have been well protected, so that if any contractor has failed in his work, it has been because he was not forced to fulfill the agreement he signed with the city.

EARLY METHODS OF REFUSE DISPOSAL.

A most vital part of the work of city cleaning, and particularly in a town so densely populated and at the same time surrounded by water, as is New York (I refer to the present boroughs of Manhattan and the Bronx), is the removal and disposal of the wastes collected from the inhabitants. The great tidal scour on either side of the city, together with the flood of fresh water continually pouring out of the North river, has made the sewage disposal problem in New York one of its simplest questions.

When New York began to attain such size and density of population as forbade the disposal of ashes, rubbish and food waste (garbage) by dumping the heterogeneous mass in near-by vacant lots, or in back-yards, the natural impulse was to turn to the water courses without any question as to whether the method

was wise or not. One of the disagreeable features of mankind has been and is to a very large extent his unwillingness to go to any expense that may be necessary to make his living a tidy process. The idea of expenditure for a decent disposal of things no longer of use to him is extremely disagreeable.

The wastes brought to the water front were placed upon barges whose cargoes of noisome material were in turn discharged by hand labor either into the waters of the bay or on low lands to make dock property. This latter work was carried on chiefly during the winter time, but a great deal was done in the summer at places considerably removed from existing habitations, where it was likely to escape the surveillance of health officers. A considerable portion of the eastern part of Harlem is built upon land made in this fashion. The invention of dumping boats increased the amount disposed of by dumping in the bay, as this offered the cheapest means of disposal. At first very little restriction was placed upon this work either by state or federal authorities, and the result of this work together with the equally careless dumping of slip and channel dredgings was the alarming shoaling of waters theretofore navigable in both upper and lower bays.

In 1888, the federal government had established the office of supervisor of the harbor of New York, detailing for the work an officer of the navy with power to arrest any violators of the statute which was enacted by Congress to regulate the deposit of mud and refuse. In 1893 and 1894, the state had in operation a system of inspection and regulation in conjunction with the supervisor of the harbor, but the system was costly and inefficient, and was finally abandoned in 1895. This work has since been done entirely by the federal government, which spends annually about $30,000 to prevent the city of New York from filling up its own harbor.

The large proportion of foul and unsightly wastes in the refuse disposed of by sea dumping that was of a floatable nature was a source of continual annoyance to sea-shore dwellers. Up to 1895, the only real efforts made to mitigate this nuisance were a few, feeble and futile attempts at cremating the heterogeneous mass of ashes, street sweepings, garbage and general débris as it was collected at that time, and by fixing the place of deposit in summer time at a point considerably further off shore than during the winter season. The latter really did not help the

matter any as it simply changed the location of the shore fouling but did not lessen it.

In 1893 the amount of material which the street cleaning department was obliged to dispose of had so increased and sea deposit had become so irksome that the scheme was conceived of enclosing at Riker's island in Long Island sound, opposite 138th street, about seventy acres of land under water which was owned by the city, and of depositing behind the enclosing cribwork the refuse of the city. The enclosure was made by the dock department and the work of filling began in the winter of 1893-94. The approach of warm weather accelerated putrefaction in the reeking mass discharged behind the cribs, so that it became necessary for neighboring residents to appeal to the state legislature to stop the work, which was done by an act prohibiting the deposit behind bulkheads adjoining the waters of New York bay and harbor of any material containing decaying animal or vegetable matter. It seems extraordinary, to say the least, that a matter so vital to public health and comfort could not have been cared for properly by the conjoined action of the city departments of health and street cleaning without the action of the legislature.

On July 26, 1894, Mayor Gilroy appointed a commission to investigate the subject of refuse disposal, and in November the commission made the following recommendations:

First.—That dumping city refuse in any water of the harbor or its adjacent or tributary waters should be absolutely prohibited.

Second.—That the ordinance requiring householders to keep separate the garbage or kitchen refuse from ashes and other house refuse should be rigidly enforced.

Third.—That all house refuse should be collected in galvanized iron vessels with tight fitting metallic covers of such size that when full they can easily be handled by one man.

Fourth.—That daily collections of garbage should be made by the city and delivered at the dump wharves into temporary storage or to self-propelling boats of some approved type, to be furnished by the party having the contract with the city for the final disposition of the garbage.

Fifth.—That the garbage should be disposed of by a reduction process producing fertilizer and commercial grease; that the city should invite competition by the various companies controlling such systems in order that the greatest benefit to the city may result.

Sixth.—That a separate collection should be made of the remainder of the refuse of the city, not otherwise provided for, which should be used for filling at Riker's island, or elsewhere, and for the transportation of this material a sufficient number of self-propelling boats of an approved type should be constructed and owned by the city. It should, however, be provided that whenever the whole or any considerable portion of the street sweeping can be disposed of by contract or sale for fertilizing

purposes, at a price greater to the city than their value for filling, then such disposition should undoubtedly be made of them.

Such was the state of refuse disposal and the street cleaning department's position of inadequacy to deal with the situation at the end of 1894 when the management of the work came under the control of Col. Waring, on January 1, 1895. The year 1895 was spent in the careful investigation of conditions, plants, machinery, etc., in line with the recommendations made the preceeding November by Mayor Gilroy's committee.

REFUSE DISPOSAL UNDER NON-PARTISAN GOVERNMENT.

The first recommendation was accepted unreservedly with the second, as this arrangement of the work would largely free the mass of refuse from foulness, and allow the cessation of sea dumping by using the balance of refuse, after the separate disposition of garbage was accomplished, for low land filling if no better plan presented itself or was found by investigation.

Experience proved that the following out of the third recommendation would be unwise on account of the great increase in collection cost that would thereby be entailed which would be entirely out of proportion to any real benefit derived from such a system.

In spite of the protestations of many who were familiar with the work of the department that it was utterly impossible to enforce the separation ordinance referred to in the second recommendation, experiment showed that it could be done, thereby rendering feasible the adoption of the fifth recommendation as to the disposal of the food waste by a system which returned commercial grease and fertilizer. This system appealed strongly to the commission and also to the commissioner of street cleaning on the basis of economy as well as sanitation, it being the belief that a process of garbage treatment which could recover from this waste commercial products, certainly ought to be used, provided the sanitary results were satisfactory, in preference to a system which disposed of the garbage by complete destruction.

Four year's experience has proved that the system does not accomplish all that a system of garbage disposal ought, but the contract that was made in 1896, with a corporation which erected a plant on Barren Island, and since then has cared for the garbage of Brooklyn as well as old New York, was a good one for the city in

that it allowed, by 1897, the cessation of the practice of dumping garbage at sea, and accomplished a decent disposal at a cost not at all high in proportion to the advantages derived. The city pays to the contractor $89,990 per annum for the transportation from the water front of the boroughs of Manhattan and the Bronx to Barren Island in Jamaica Bay and the disposition of about 150,000 tons of garbage. This is about sixty cents per ton. The cheapest disposal cost by sea dumping of the mixed wastes as compared with this figure was about twenty-five cents per ton. As the garbage only constitutes about ten per cent by weight of the total quantity of refuse, this increase in cost per ton was not as serious as might first appear.

The fourth recommendation, as to daily collections, was carried out, but experiment proved the entire futility of applying a storage dump and self-propelling boat transportation scheme in the handling of garbage, and consequently recourse was had to the barge system which is now in use as in 1896. There is offered here a wide field for improvement in the future in the matter of cleanliness.

The enforcement of the ordinance requiring householders to separate garbage from their other wastes, brought out clearly one of the many instances showing how poorly correlated are the various departments of the city. The act of 1892 virtually makes the commissioner of street cleaning a health officer in that it confers upon him "cognizance and control" of the work of street cleaning and refuse disposal "as frequently as the public health may require." The commissioner of street cleaning, however, is not a member of the board of health and has practically none of the powers that body possesses as to the punishment of violations of the sanitary code. Consequently in the punishment of flagrant violations of the separation ordinance in 1896, the plan most successfully adopted by the officers of the street cleaning department was to secure court summons and prosecute the offenders for committing a misdemeanor in the same fashion that one citizen might prosecute another. Minor offenses were cared for by officers of the department exercising their power of arrest, and by bringing the offender before a magistrate for fine. In 1896 the discipline of the department officers was so good and their influence upon the public so strong that within a month after notice was sent to householders in August, 1896, the complete and thorough separation of the

garbage from the other refuse was an established fact. At the beginning of the enforcement of the separation ordinance, a small squad of police was detailed from the police department to aid in the work, but this was soon reduced to one or two policemen in each district (Manhattan and the Bronx were then divided into eleven street cleaning districts).

RUBBISH DISPOSAL.

Before the question of garbage disposal was settled in 1896, investigation was begun on that branch of the work outlined in the sixth recommendation referred to above. Col. Waring found in existence at the beginning of this work, an extremely interesting and unsanitary system which immediately attracted his attention; and was very carefully investigated. The use of barges to convey refuse necessitated the employment of labor at the water front dumping places to "trim" the material on the boats. About twenty years ago, the labor cost the city some $11,000 per annum. The work was done by Italians who, while they levelled the refuse dumped on the scows, culled a wide assortment of articles which they sold at a profit. The work offered such pecuniary advantages to the class of men engaged in it, who are as distinct in their personality as the chiffonniers of Paris, that soon competition arose and increased with the growth of the city, so that in 1894 the city received for the privilege of doing this work, from an Italian contractor, a cash payment of about $90,000 and labor gratis worth about $50,000 more.

The sanitary objections to this were many and great. Investigation showed that there were, however, certain features worthy of development. The letting of the garbage contract removed from the refuse the food waste which had fouled the entire mass. There was left, aside from the ashes and street sweepings, an immense amount of waste paper, cardboard, cloth clippings, etc., which was clean until put into the ash can. This was valuable paper stock, and there was apparently no need of destroying it except in times of epidemics. The importance of this part of the work of refuse disposal evidently had been overlooked by the Gilroy commission, as their sixth recommendation seems to have assumed that the separation of the garbage made possible at once an economical system of transportation and disposal of the balance of the refuse. Investigation and experiment showed that a system of transportation such as outlined was no more economically practi-

cable than in the case of garbage disposal unless the ashes and street dirt were freed from the enormous quantity of paper and household débris collected with them.

A system was then inaugurated of separate collection of the waste paper and household rejectamenta, which was so arranged as to be convenient for the householder and to add no financial burden to the cost of collection. Small experimental plants were erected in 1896 and 1897 and investigations were carried on as to the possibilities of the value of the rubbish in its saleable portion, the fuel value of the unsaleable part, the utilization of the heat, etc.

During the period of experimental work, the disposal of the great mass of the ashes and rubbish was continued in the old way, viz.: by sea deposit and under costly agreements necessary partly because of unwillingness to radically change the system before all available data had been secured, but largely because the dock department would not give adequate terminal facilities for loading at the water front. Argument persistent and earnest finally secured in 1899–1900 a half hearted granting of facilities that were necessary in 1896. Better means would have allowed the complete freeing of the great mass of ashes and street sweepings (about 6,000 cubic yards daily) from the encumbering litter of paper and rubbish, and its consequent utilization in developing city property (Riker's island).

The dock department of New York derives the money for carrying on its work from dock rentals. The fact that the giving up of a few thousand dollars of rentals in order that the increase in terminal facilities might allow the street cleaning department to carry out plans to result in the return to the city a hundred fold this loss was no inducement to grant these privileges. Another illustration of this same lack of co-operation was shown in 1896–7 when in conjunction with the experimental work on the transportation question the street cleaning department requested of the dock department permission to erect a storage dump whose design contemplated the occupancy of so much of a slip as would allow of the loading of a barge, or self-propelling boat, completely under cover, thereby obviating to a large extent the dust nuisance incident to the loading of ashes at the water front. The request was refused as it might have been to a citizen who wished to benefit his pocket at the city's expense.

The work done up to the end of 1897 pointed out a course of action about as follows which Col. Waring intended to pursue: The operation of the experimental rubbish plants had practically determined the advisability of taking this class of city refuse to a single destructor plant outside the city's limits, where the economy of operation of a single plant instead of several smaller plants within the city would outweigh the cost of water transportation. This plan was to be carried out at once with an eye to the utilization of the plant built, not only for rubbish disposal, but also for garbage treatment should it become advisable to abandon the system then in operation under the contract let in 1896 for garbage disposal for five years. The ashes and street sweepings were to be used in land development at Riker's Island.

POLITICIANS TAKE CONTROL.

Such was the condition of the work when the Greater New York charter went into effect and James McCartney became commissioner of street cleaning. He owed his appointment to his merit as a political worker and leader in the Tammany organization. Neither his previous work nor his temperament fitted him for a proper comprehension of the work he was to supervise, but he honestly intended to do his work well, and his desire before his death was to feel that he had successfully administered a great undertaking which had been broadly planned in scope, and that he had helped along what had been well begun.

His task was the impossible one of serving two masters. The change in administration brought into play forces over which he had no control and which effectually checked him from accomplishing things which he most desired, and which would have benefited the city. He had no say in the appointment of his deputies for the boroughs of Queens and Brooklyn. Lack of training and experience in sanitary work, and lack of familiarity with the details of the work of the department naturally made him wait for a long time before going ahead with any of the plans laid out by his predecessor, for fear of committing errors for which he might be blamed on the score of economy. His desire to preserve the standard of work that had been established made it necessary to antagonize various leaders of his political organization. Those leaders, who were members either of the municipal assembly or of the board of alderman, took very effective revenge for what they

could but consider personal slight, by blocking measures in the interest of the street cleaning department.

DETERIORATION OF SERVICE.

The political influences at work among the employees also resulted in the degeneracy of the Committee of Forty-one into a body which totally failed, under the conditions, of operating beneficially for the workmen, and in 1899 led to its abolishment and the substitution of a board consisting of the general superintendent, the assistant superintendent, and the superintendent of final disposition, which held informal hearings of complaints and grievances and made recommendations to the commissioner as to what course to pursue in the various cases.

The provisions of the new charter deprived the officers of the street cleaning department of the power to arrest violators of those sections of the sanitary code affecting the work of street cleaning. Commissioner McCartney made a formal request of the police department for a detail of policemen to aid in the work of enforcing these provisions in the untidy sections of the city. The request was not granted, and although renewed from time to time both by himself and the present commissioner, it has not been granted.

One result of this failure of co-operation, coupled with a drop in the discipline of the department's officers and men, which allowed of too much perfunctory performance of duty, was the complaint in 1899, made by the company having the contract for garbage disposal, that in the boroughs of Manhattan and the Bronx the separation of garbage from other refuse was so poorly accomplished that large quantities of bones and fat, valuable for their use and to which they were entitled by the terms of their contract, were not delivered to them at all, but, mixed with the ashes, were dumped upon the scows supposed to carry no garbage, from which they were picked by the "trimmers" and sold. The matter was finally settled by the department of street cleaning agreeing to pay the trimmers of the ashes for picking out bones and fat and delivering the same to the garbage company. Under this agreement the department paid in the last week in December $2,100 in round figures. At this rate the city would pay annually instead of the contract price of $89,990 for the present boroughs of Manhattan and the Bronx, nearly $200,000. This agreement, which had been made by

Commissioner Nagle, who had succeeded Commissioner McCartney on the death of the latter in February, 1900, was terminated by him in January, 1901, on account of the great expense involved. The root of the matter (the proper separation of the garbage) was not touched however, and although a direct payment of money from departmental appropriation was saved, it seems possible to believe that the garbage company may seek means to have the city live up to its side of the contract or give compensation for its failure so do to.

It is interesting to note the quantities of garbage collected in New York since the beginning of the contract above referred to.

		Tons of 2,000 lbs.
1897	New York (Manhattan and Bronx)....	154,000
1898	Manhattan and Bronx.....	139,000
1899	" " "	151,600
1900	" " "	146,600

Instead of a normally expected increase of from three per cent to five per cent per annum, there is an irregular decrease with a smaller collection in 1900 than in 1897. As the payment for garbage disposal is a lump sum per annum while the payment for ash disposal depends on the size of the output, another idea of the financial loss by poor separation can be gained by reference to the table just given.

In 1898 and 1899 no change was made in the method of rubbish disposal from that employed in 1897, chiefly on account of delay on the part of the dock department in furnishing terminal facilities and partly on account of the desire of Commissioner McCartney to conduct other experiments before committing himself to any plan of action. Sea dumping continued during 1898, and complaints from shore dwellers on the Long Island south shore of débris cast up at their doors were numerous and bitter in spite of the distance at sea where the point of discharge was located.

EXPERIMENT AT RIKER'S ISLAND.

In order to avoid this the next summer, Commissioner McCartney advertised in August, 1898, a contract for the unloading behind the old cribwork, built at Riker's island in 1893–4, of the ashes and rubbish it was necessary to load on the barges at the New York water front, hoping that before the contract

expired (it was for one year) means would be found for the separate and proper disposal of the rubbish. An exceedingly low price was obtained considering the character of the material to be handled, and in January, 1899, the contractor began work with a plant erected at a cost of from $50,000 to $60,000. It was a failure. the contractor assigned to another contractor with the approval of the commissioner. The second contractor also succeeded in erecting a failure as decided, though not as costly, as the first. The department was accordingly obliged to continue the disposal of its ashes and rubbish by sea dumping, and the few available jobs of land filling, where property owners did not object to receiving the heterogeneous mass of ashes, street sweepings, paper, boxes, barrels, cans, etc.

The failure in April, 1899, of the enclosing cribwork at Riker's Island caused the War Department, which has control of harbor lines, to forbid the placing of any more material behind it until a properly constructed sea wall was built. The street cleaning department, wishing to use the enclosure for ash dumping, requested the dock department to make the necessary repairs, which would cost from $100,000 to $150,000. The department of correction, now occupying the island, urged action, as it desired the additional land. The dock department courteously informed the street cleaning department of its entire willingness to do the work if the street cleaning department would furnish the funds. The street cleaning department declined to furnish any funds out of its own pocket and the matter now rests until taken up by some one or some administration capable of dealing with the matter in a businesslike fashion.

INTERFERENCE FROM ALBANY.

In 1898, an agitation was begun by citizens of Arverne against the garbage company's plant on Barren Island in Jamaica Bay, on the ground that the operation of the plant was noisome. The agitation took the form of a bill, which was presented in the legislature at Albany in the session 1898–1899, forbidding the operation of the plant at the end of six months from the time of passage of the act. The governor vetoed the bill on the ground that six months was too short a time for the street cleaning department to provide other means of disposal.

The garbage company in 1899 made extensive alterations and improvements in its plant for the mitigation of the nuisances

complained of, but the agitation was continued, and in the legislature session of 1899–1900 a bill, similar to the one passed the preceding year, was introduced. This bill allowed the plant twelve months of operation from the time it became law, which was in April, 1900.

The representatives of the street cleaning department that appeared before the cities committee of the senate and before the governor requested that the bill, which practically abolished the Barren island plant, be so drawn that the contracts the garbage company had with the boroughs of Manhattan and the Bronx (old New York) and with the borough of Brooklyn (old city of Brooklyn) be allowed to expire before the time limit of operation of the plant fixed by the act was reached. (This time limit extended to but three months before the expiration of the Manhattan and Bronx contract and seven months before the expiration of the Brooklyn contract). They asked this because the contract with the garbage company for the borough of Manhattan would end on August 1, 1901, and the department of street cleaning ought in the proper conduct of its affairs to re-advertise the work by June, 1900, in order to allow time for investigation and building of a new plant, should it be advisable or necessary to adopt another system of disposal. Another reason was to prevent the possibility of a suit for damages by the garbage company against the city. The city was not bound to renew its five years' contract and the prohibiting of further use of the plant at the expiration of the contracts could be no cause for action against the city by the garbage company.

The legislature however passed the bill. The mayor disapproved it, but it was repassed by the legislature and signed by the governor. The garbage company took the matter to the courts where the act was declared unconstitutional in that it broke existing contracts without providing compensation to the contractors, virtually depriving them of their property without due process of law. The matter will have been worth while if it serve as instruction to Albany legislators in their dealings with city problems.

CITY'S INTERESTS NEGLECTED BY THE PRESENT ADMINISTRATION.

The question was never one of serious moment to the street cleaning department as there was ample time for advertising for the construction of other plants than those in use at Barren Island. Independently of the action of the legislature and in view of the

fact that the Manhattan and the Bronx contract would expire August 1, 1901, and the Brooklyn contract December 31, 1901. Commissioner McCartney, in January, 1900, about a month before his death, ordered the beginning of work on contract specifications for refuse disposal, including the garbage, to be so arranged that the company then having the garbage contract could bid if they were not disqualified by the act of the legislature. The contract forms for garbage disposal were ready in April, 1900. It is worthy of note that up to January 31st, 1901, they have not been advertised. As the process of advertising and selecting bids in matters of final disposition have occupied in the past from one to four months, and as the building of a plant for garbage disposal for New York is a matter of ten or twelve months, it is evident that when the existing contract for the disposal of the garbage of Manhattan and the Bronx expires August 1, 1901, the city will have no recourse but to accept the terms of the company, as the disposal of garbage by sea deposit is out of the question both by reason of law and practice.

The law makes it necessary to advertise city contracts for at least ten days in the *City Record* and optionally in such other newspapers and for such time as may be desired. If the present garbage company should have the privilege of bidding under a ten day advertisement in the *City Record* alone, before or after the expiration of the present contract, it would know that competition for a work demanding the erection of a plant would be practically eliminated, and it would have the opportunity of securing another five year's contract practically upon its own terms.

The garbage disposal question is a very imminent and serious one for New York. It is not settled yet. The work begun by Col. Waring has led to possibilities in the work of which he did not think in 1895. There are those, whose knowledge and experience are worthy of consideration, who firmly believe that a continuance of a garbage contract like the present one for five years would be a great block to the progress of this important sanitary work along lines which will lead to the most economical solution from the standpoint of best sanitation.

CESSATION OF SEA DUMPING.

In August, 1900, the pleas made to the dock department for more water front terminals, which were begun in 1896 and 1897

and continued through 1898 and 1899, had been granted to an extent which allowed the separate loading of the rubbish at the water front. This made possible the abandonment of sea dumping of refuse, as the rubbish was disposed of in Newark Bay by a crude and very costly system of transportation and unloading on waste land, and the ashes and street sweepings freed from this encumbering mass of débris, found ready outlet for use as filling for many dock properties within easy reach of the water front dumps. This work could be wonderfully cheapened by advertising for its disposal by contract for three or five years instead of the present system of day-to-day agreements which the laws gives the commissioner power to make.

This result of the work begun in 1896 means that it will never again be necessary to dump city refuse of any kind in the Atlantic ocean from April until December and if any sea dumping becomes necessary between December and April of any year, there need be no floatable material carried out in the boats going to sea.

One of the most serious problems to-day confronting the department of street cleaning is the removal and disposal of the ashes accumulating from the boiler plants of office buildings and manufactories on the island of Manhattan. Different commissioners have asked the corporation counsels for an opinion as to the department's duties in the matter, and all have managed to avoid a direct answer. The matter has been settled up to the present time by the owners of such premises paying private cartmen to remove the ashes to the water front where the street cleaning department receives and cares for them on its boats. Nearly 500,000 tons of ashes were delivered at the department's water front dumps by private carts in 1900. To have carted this with department carts would have necessitated an expenditure of about $300,000 more than was actually spent in 1900 for the work of carting.

The same problem arises in the case of all sorts of wastes coming from various trades, the care of which was not contemplated in the law governing the work of the street cleaning department. Many of these wastes are offensive and their careful and proper treatment is demanded for the welfare of the city's health. It is well to note here that the care of these wastes constitutes one of the points where the present garbage contract is lacking, as the system used is not capable of treating many of them.

EFFECT OF CONSOLIDATION.

As far as the operation of the street cleaning department is concerned, the creation of the greater city brought no practical benefits on the whole. As before stated, the deputy commissioners of the boroughs of Queens and Brooklyn were appointed as political expediencies, with no particular regard for their fitness the work coming under their control. The political leaders of Brooklyn were particularly jealous of their patronage claims, and generally managed to avoid all interference from New York with their plans.

Perhaps the best illustration of this was when it became necessary to hold examinations by the municipal civil service boards under the White law for the making up of a list of men eligible for appointment as district superintendents in the borough of Brooklyn. The civil service law as applied to examinations in the department of street cleaning makes no distinction as to boroughs, and distinctly states that promotion examinations for the next lower officers in grade must be held before any examinations for a position are opened for outside competitors. The natural and wise course would have been in this particular case to have held a promotion examination to be taken by the Manhattan and the Bronx (old New York) foremen (the next lower in grade to district superintendents) for promotion to the position of district superintendent to fill the positions in Brooklyn. The foremen in Manhattan and the Bronx were in direct line of promotion, were familiar with the duties of superintendent, and the best of them well fitted for the positions. It seems that the law was especially intended to provide for such cases in preventing the exclusion of men ready for promotion by taking men outside the working force. However, the civil service boards held an open competitive examination for the position of district superintendent in the borough of Brooklyn (not for the city of New York). Consolidation on such a plan as this necessarily means but little.

What has been written is sufficient, I believe, to show the necessity of a head to such a bureau as the street cleaning department who possesses not only executive ability of the highest order, but also an acquaintance with the progress and status of sanitary science in its best development in order properly to comprehend the needs of the work, secure the needed co-operation of

all municipal and state authorities and to execute the plans desired by the best authorities for the best performance of the work. To-day there is not among the officers of responsibility in the street cleaning departments, an engineer who has made a specialty of sanitary work in this branch of city cleansing.

It would seem as needless to reiterate that the commissioner who attempts to use the department as a lever for increasing the strength of a political body will fail in doing properly the work, as to say that as long as the citizens are content to see this branch of their housekeeping so managed they must be content with large expenditures and poor results.

Review of the sketch just given of the work of the street cleaning department for the past six or eight years, plainly shows that improvement and scientific development of this most important sanitary work was only possible in that period when the department was freed from the baleful influence of the New York politician. Great as was Col. Waring's ability as an organizer and developer, he frequently and frankly admitted that his success would never have been possible had he accepted his commission on any other basis, or had he administered it in any other way than he did. By the nature of New York's political system, that method ceased when Col. Waring retired from office, and to-day, it may be said with perfect fairness that whatever progress has been made in this work since 1897 reflects no particular credit upon the succeeding heads of this bureau of the city's work, as it has been entirely due to movements inaugurated in the years 1895 to 1897 which have come to more or less perfect conclusions in spite of the hampering conditions imposed by the present administration.

NEW YORK PUBLIC SCHOOLS.

By William H. Maxwell.

During the school year that commenced August 1, 1899, and closed July 31, 1900, 523,419 different pupils received instruction during the whole or a part of the year in the public schools of the city of New York. This number shows an increase of 29,570 pupils or about 6 per cent over the preceding school year. The rate of increase was highest in the borough of Richmond and lowest in the borough of Brooklyn. In Manhattan and the Bronx, it was 6.5 per cent; in Brooklyn, 4.2 per cent; in Queens, 8.7 per cent; and in Richmond, 12.1 per cent. Of the whole population as ascertained by the census of 1900, 14.6 per cent of the inhabitants of Manhattan and the Bronx attended the public schools some part of the school year; 15.4 per cent of the inhabitants of Brooklyn; 19.8 per cent of the inhabitants of Queens; and 18.2 per cent of the inhabitants of Richmond. That a larger proportion of the population in the semi-rural boroughs of Queens and Richmond attend than in the urban communities of Manhattan and Brooklyn, is probably due to the fact that private and parochial schools are much more numerous and much better equipped in the more densely than in the less densely populated boroughs.

The average daily attendance during the last school year was as follows: Manhattan and the Bronx, 219,932; Brooklyn, 129,175; Queens, 21,227; and Richmond, 7,877; a total of 378,211. During the same period the average register for the entire city was 418,951. The percentage of daily attendance on average register indicates the regularity of attendance. In Manhattan and the Bronx, this regularity reached a standard of 92 per cent; in Brooklyn, of 88 per cent; in Queens, of 89 per cent; and in Richmond, of 85 per cent.

MORE SCHOOLS NEEDED.

October is the month in which the attendance on the public schools is usually the largest. On the 31st of October, 1900, the register of pupils was as follows: Manhattan and the Bronx,

253,608; Brooklyn, 155,279; Queens, 25,913; Richmond, 9,717—a total for the entire city of 444,517. Of this number, owing to lack of accommodations, 68,929 children received instruction for only half of each school day. Of this number of part-time pupils, 20,446 were in Manhattan and the Bronx; 42,619 were in Brooklyn; and 3,815 were in Queens.

If we take one half of the part-time pupils, as a measure of the additional school accommodations needed to catch up with the growth of population—though this standard takes no account of children refused admission—it is obvious that buildings containing 34,500 sittings are required at once. The buildings that are now under contract for construction will contain about 32,000 sittings. If, therefore, all of these buildings were to be opened during the current school year, they would not be sufficient to provide a full day's instruction for every child now on the register, while they make practically no provision for the annual increase in the school population. This annual increase is about 18,000 in Manhattan and the Bronx, 5,000 in Brooklyn, and 2,000 in Queens and Richmond. To provide for this annual increase in the number of pupils would require an annual expenditure of about four millions of dollars. This sum would not, however, provide for high school buildings which are now sadly needed, the Manhattan high schools being scattered over the city in old elementary school buildings and in sections of new buildings. To provide properly for the high school pupils of Manhattan and the Bronx, would require an immediate expenditure of between three and four millions, and for the high school pupils of Brooklyn of about two millions of dollars.

These facts and figures show how inadequate is the provision made by the board of estimate and apportionment for new buildings to be undertaken during the current year. A bond issue of three millions and a half has been authorized for this purpose. The board of education asked for fourteen millions. If population continues to increase at present rates, the crowding in the schools and the number of children who receive only part-time instruction or are prevented from entering the schools, are destined to grow to enormous proportions. If there is any truth in the universally accepted doctrine that the education of citizens is the only safeguard of democratic institutions, it is difficult to avoid the conclusion that the insufficiency of school accommodations in New

York city, tending as it does to perpetuate ignorance and to retard the growth of intelligence, is a most serious menace to our municipal welfare.

THE NEW HIGH SCHOOLS.

The number of teachers employed in instructing the 444,517 pupils in October last was 11,133. In this number are included 684 principals and principals' assistants who give their whole time to supervision, and 276 supervisors and teachers of special branches, such as drawing, shop-work, cooking, sewing, music, and the like. Of the regular teachers, 21 were engaged in training pupil-teachers in two training schools, and 497 in high school work. In addition to the teaching and supervising force employed in the schools, there are 35 superintendents: a city superintendent, a borough superintendent in each borough, 16 associate superintendents in Manhattan and the Bronx, 10 in Brooklyn, 2 in Queens and 2 in Richmond.

Perhaps the most notable feature of the New York City public school work during the past year was the wonderful growth of high schools in Manhattan and the Bronx. High schools were first established in the old city of New York in September, 1897. The total enrollment of pupils in these schools during the school year 1899–1900 was 7,622, an increase of 56 per cent over the preceding school year. The urgent popular demand for secondary education in the public schools furnishes ample justification for the establishment of these institutions and for the expenditure of public money in their maintenance. It is only through a high school education that the son of a poor man obtains an approach to equality with the son of a rich man in opportunity for success in life. The people have not been slow to recognize this fact. And, though we occasionally find some feeble-minded politician attempting to gain a little cheap notoriety by attacking the high schools, yet nothing in the future is more certain than that the high schools, if they continue to deserve popular support, will receive it in abundant measure. Any city government that should attempt to abolish the high schools would soon be swept out of existence by the votes of the people.

COST OF PUBLIC SCHOOLS.

The cost of the public schools forms a large item in the city's expenditures. The money required for their support is appropri-

ated in two funds, the general fund and the special fund. In the general fund are included the salaries of teachers and superintendents; in the special fund, the moneys required for maintenance and repair of buildings, school furnishings and supplies, salaries of the clerical force, and other matters pertaining to the physical side of public education. These moneys are appropriated for the calendar year; but, as all the statistics of attendance are collected for the school year, which extends from August 1 until July 31, the per capita cost of instruction is calculated for the school year, not the calendar year.

The following table shows the amounts expended from these two funds, and also the proceeds of the sale of bonds for the erection of new buildings, during the school year that ended July 31, 1900:

Borough	General Fund [1]	Special Fund	Bonds
Manhattan and the Bronx.....	$6,790,280.58	$1,559,987.85	$3,855,810.39
Brooklyn.....	4,328,919.86	709,589.81	1,137,030.16
Queens.....	676,854.91	183,088 41	185,850.67
Richmond.....	252,856.68	89,718.75	98,905.11
	$12,048,911.48	$2,542,329.82	$5,277,596.33

The cost for each pupil in average attendance, without counting the amount expended on new buildings, was as follows:

Borough	General Fund	Special Fund	Total
Manhattan and the Bronx.....	$30.86	$7.09	$37.95
Brooklyn.....	33.51	5.42	38.93
Queens.....	31.89	8.62	40.71
Richmond.....	32.10	11.39	43.49

The *per capita* cost is lowest in Manhattan and the Bronx and highest in Richmond. The increase in cost has been greatest in Brooklyn, where it has risen in one year from $29.19 per pupil to $38.93 per pupil.

CENTRALIZATION *vs.* DECENTRALIZATION.

The administrative system under which the schools have been managed since consolidation is the result of a compromise—a com-

[1] Includes revenue bond issue for teachers' salaries.

promise between the centralizing forces inherent in a great municipality and the decentralizing forces that naturally spring up in the various boroughs. This compromise resulted in a system that leaves the management of the schools on the educational side in the hands of a school board and a board of superintendents for each borough, and the management on the physical side in the hands of a board of education composed of delegates elected by the school boards. Teachers are licensed and eligible lists are prepared by a board of examiners, consisting of the city superintendent and four examiners, all appointed by the board of education. Appointments, transfers, and promotions of teachers are made in all boroughs except Brooklyn by the school board, on the nomination of the borough board of superintendents. In Brooklyn, appointments and promotions of teachers are made on the nomination of a local committee for each school. The local committee system has long been recognized by experts as the worst system possible, except perhaps the ward trustee system as it formerly existed in the old city of New York and as it still exists in Philadelphia. It is the fruitful source of favoritism. It exercises a demoralizing influence on the teachers, who soon learn that, except in so far as it is restrained by the licensing system, "pull" has greater influence than merit in securing advancement.

The boroughs of Manhattan and the Bronx, on the other hand, are now giving an object lesson to the country on the best method of appointing and promoting teachers. By the simple expedient of appointing from the eligible lists in the order of standing at examination, the appointment and the promotion of teachers have been absolutely divorced from politics.

This compromise or dual system of administering the schools has not been successful. It is unnecessarily expensive, because of the duplication of machinery by the borough and central authorities. For the same reason it is needlessly cumbrous. Text books and other school supplies, for instance, are selected by the borough authorities, but purchased and furnished to the schools by the central authorities. Again, it is not effective to raise the schools to the highest standard of efficiency, because responsibility is divided. If supplies are delayed in reaching a school, if necessary repairs to a school-house are not promptly made, if the payment of teachers' salaries is not made on the appointed day, if a mistake is made in the selection of a school site, it is now dif-

ficult, if not impossible, to fix the responsibility for such shortcomings. Add to these defects an aggressive resistance on the part of the borough of Brooklyn to almost everything done or attempted by the central authorities, and it will at once be seen that the compromise system has been a failure. An administrative system in which one of the component parts is making constant appeals to the courts in order to obtain privileges not granted to the other parts, and in which the central authority is powerless either to appease or to control the subordinate authorities, stands self-condemned.

THE DAVIS LAW.

The only change made in the educational chapter of the charter since its enactment was by the so-called Davis law, which was signed by Governor Roosevelt May 3, 1900. This measure, though badly drawn and containing some objectionable features, I regard as of the highest utility and importance. Its chief provisions may be classified under three heads: first, it provides that the amount of money to be raised for purely educational purposes (by far the largest item of which is teachers' salaries) shall not be less than four mills on the dollar of the assessed valuation of the real and personal estate within the limits of the city; second, it places in the hands of the central authorities the power to disburse the general school fund and to make uniform schedules of teachers' salaries that shall prevail in all boroughs; and, third, it fixes minimum salaries for nearly all classes of the supervising and teaching force.

The first of these provisions—the four-mill provision—though it is now severely criticised as an infraction of the principle of home rule and as laying a heavy burden on the taxpayers, I regard as the most useful and beneficent part of the law. Having seen most salutary educational reforms thwarted or delayed by the failure of the city's financial authorities to make necessary appropriations, having seen the schools crippled through lack of money to pay teachers, having seen teachers compelled to wait months to obtain the money they had earned, I naturally welcome a measure which gives the educational authorities a sure and certain income for the maintenance of the schools. In this respect, the Davis law really marks an epoch in city school administration—an epoch from which shall be dated the elimination of politics and

politicians from the determination of educational appropriations. It is simply the application to a great city school system of the principle that has made so wonderfully successful the great state universities of the west—the principle that a school system to keep pace with the demands of a growing population and with the requirements of modern life, must have a revenue, not fluctuating at the dictation of political organizations nor according to the whims of politicians, but so stable that lack of funds shall never interfere with the public education of children—the most vital interest of the state—and so elastic that it will grow with the growth of wealth and population.

The second provision—the placing in the hands of the central authorities the disbursement of the general school fund—has justified itself in the greater promptness and regularity with which teachers are paid. The regularity and promptness would be still further improved were the authority to prepare pay-rolls also placed in the hands of the central authorities.

The third provision—the fixing of minima for teachers' salaries—is, I believe, fully justified by the conditions that existed prior to the passage of this act. I have not space to go into a history of teachers' salaries in the several boroughs. Those who are curious on this very interesting subject I would refer to my Annual Report for 1899–1900. The following excerpt presents in succinct form the more important features of the discussion :

For many years prior to the agitation that commenced in 1897 for a revision of the salary schedules, there had been gradually taking shape in the minds of the teachers certain notions that were the direct result of the conditions and events just described. These notions, vague and indistinct at first, gradually assumed form and consistency and became at last determining forces influencing the teachers to appeal to the legislature. They may be gathered up under five headings :

1. The feeling that the average salary paid in former years was altogether too low as a remuneration for the service rendered and too low to be consistent with the dignity of the teaching profession.

2. The feeling that the various salary schemes formerly in force resulted in widespread injustice, which in turn led to constant unrest.

3. The feeling that the wire-pulling which was too often necessary to secure promotion and consequent increase in salary, was unworthy of a body of self-respecting public servants, and ought to be eliminated.

4. The feeling that all of these things—the smallness of the average salary, the widespread injustice, the resulting unrest, and the unseemly wire-pulling into which teachers were forced—were impairing the usefulness of each individual teacher, and that the system as a whole was suffering in consequence.

5. The feeling that no matter how willing the school boards might be to remedy abuses, no matter how wisely they might plan new salary schemes, the financial author-

ities of the city would not grant the money necessary to correct the abuses and put the revised schedules into effect.

In a word, the teachers felt that the old salary system was one under which they could not do their best work; that it was retarding the progress of the school system and that the first condition of a genuine educational revival is to place salaries not merely on a liberal, but on a rational basis. Nothing could be more unjust than the sweeping statements of men high in office that the teachers, in appealing to the legislature to determine their salaries, were actuated solely by greed for money. It is not so. The teachers deserved better salaries. They desired and asked for better salaries; but in doing so they sought not personal advantage alone, but the good of a city which they love and the good of schools to which they have dedicated their energies.

Those who denounce the Davis law do so chiefly on the ground that it is a violation of the principle of municipal home rule. They seem to forget, however, that there is another principle of our government of equal importance: the right and duty of the state to intervene to protect the citizen from wrongdoing or neglect of duty on the part of municipal authorities. Particularly does this principle apply in the case of public education. Primarily, education is a function of the state. The city, equally with the smallest rural school district, acts, in maintaining public schools, only as the agent of the state. The state has reserved to itself the right to step in and manage the public schools when any municipality fails to perform its plain duty, and it has provided the machinery for so doing. In the present instance the simple question to be determined is whether a condition of affairs existed such as to justify the legislature in intervening with regard to educational appropriations. The advocates of the Davis law believe that such a condition existed.

CHARTER REVISION.

As I have pointed out, the Davis law is a long step toward centralization. It may confidently be believed that subsequent changes in the educational chapter of the charter, intended to rectify existing defects, will be in the same direction. Such confidence is justified by two reasons. The first is that the administrative system has been successful only so far as authority has been centralized and responsibility fixed. The second is that the schools are supported by a uniform tax levied throughout the entire city. Such a tax places the heaviest part of the financial burden on Manhattan—the richest and most populous of the boroughs. So long as Manhattan money goes to support the schools in the other boroughs, representatives of Manhattan will

have, and ought to have, a voice in its expenditure. Decentralization of power in a city like New York is possible only in matters where the borough or the locality pays the entire cost of the undertaking. In all such matters—the opening of a street, or the laying of a sewer, which benefits only a particular neighborhood—it is right that the local authorities should have a controlling voice. But where, as in the case of the schools, the cost is defrayed by a uniform general tax, some central authority should have control.

All who have made a complete study of the existing educational system are agreed that some change, looking toward centralized control, is an absolute necessity. The charter revision commission has reported a very conservative scheme of centralized control. To expound and discuss this scheme would unduly lengthen this article. Suffice it to say that, if the charter revision commission's scheme is adopted, it may reasonably be expected that the expense of the educational system will be curtailed, that the machinery of administration will become less cumbrous and more flexible, that responsibility for shortcomings will be definitely fixed, that the merit system of appointing and promoting teachers which now prevails in Manhattan and the Bronx will be extended to the other boroughs, and that whatever is best in the schools of any one borough will soon be made the common property of all.

THE DEPARTMENT OF WATER SUPPLY.

By William F. King.

The Department of Water Supply of the city of New York is charged with the duty of purveying water for a population of 3,437,000 people. It controls and operates two great water systems owned by the municipality, and several minor plants in outlying districts, recently acquired from private companies. It also has some hazy rights of supervision over a number of small private water companies, from some of which it obtains a public water supply by contract.

COMPARATIVE COST AND UTILITY.

The Croton system supplies water to nearly 2,000,000 people in the boroughs of Manhattan and the Bronx. Two great reservoirs now approaching completion will develop this system to its utmost capacity—a minimum supply of nearly 300,000,000 gallons daily under the most adverse conditions, and a maximum supply of about 400,000,000 gallons daily under usual conditions. When these final enlargements are completed, the system will have cost somewhat more than $100,000,000 for construction.

The Ridgewood system supplies about 1,075,000 people in the borough of Brooklyn. It has thus far cost about $22,500,000 and yields about 100,000,000 gallons daily, under extreme draft. Extensions now in progress will cost about $2,500,000 and will supply about 15,000,000 gallons, thus making a total of about 115,000,000 gallons per day, which is the maximum obtainable from the Ridgewood system; but the safe supply will not exceed 100,000,000 gallons daily.

The comparative cost and capacity of the two completed systems, therefore, will be as follows:

	Cost.	Safe Capacity in Gallons, Daily.
Croton System	$100,000,000	300,000,000
Ridgewood System	25,000,000	100,000,000

On the basis of relative safe capacity the Croton system has cost about 33⅓% more than the Ridgewood system. A comparison on the basis of population shows that the Croton system serves less than twice as many people as are served by the Ridgewood system, although the cost of the Croton system is four times that of the Ridgewood system. An investment of $25,000,000 in water-works in Brooklyn supplies water to more than 1,000,000 persons (about 1,075,000); the investment made to supply less than 1,000,000 persons in Manhattan and the Bronx is about $50,000,000. Thus for the water supply of an equal number of persons, the investment is twice as great in Manhattan as in Brooklyn.

In most respects the two systems are so dissimilar that the elements of cost cannot be fairly compared. The Croton system is inherently and inevitably a far more costly work than the Ridgewood system; the former requiring numerous artificial reservoirs and aqueducts mainly tunnelled through rock; while the latter requires only small collecting reservoirs, and its aqueducts are "cut-and-cover" construction, wholly through a level country and through light sandy soil—the least costly of all conditions. In the items of land and distributing systems, however, a partial and approximately fair comparison is possible.

The total outlay for country lands (and structures thereon) for the Ridgewood system has been about $623,000, an average cost of $245 per acre. For the most part the aqueduct right-of-way passes through cultivated arable lands. The total cost of lands for the Croton system is not stated by the public reports. Since 1893 $500,000 a year has been expended for lands to prevent pollution. The average cost per acre for the lands so acquired, with the buildings thereon, has been over $1,100, a large part of the area being of little value for either cultivation or pasture. The fees paid for condemnation have been excessive, amounting to about two-thirds of the total outlay in at least three separate years. These lands recently purchased for the Croton system have cost about 4½ times as much per acre as the average cost of country lands bought for the Ridgewood system.

The cost of the Manhattan distributing system has been relatively very much greater than that of Brooklyn. At the close of 1898, there were in Manhattan 680 miles of streets having water-mains, and in Brooklyn (Ridgewood system) 558 miles; in both cases exclusive of multiple or duplicate lines in the same streets.

The average cost of the Manhattan system per street mile was $27,878.88; of the Brooklyn system, $16,845.87. The Manhattan system thus cost pro rata 66⅔ per cent more than the Brooklyn system. Part of this difference in cost is normal and due to difference in the conditions. Heavier pipe is used in Manhattan than in Brooklyn; in Manhattan much of the trenching is through rock, while in Brooklyn it is wholly through soil; the cost due to disturbance of pavements and to avoidance of other underground structures is heavy in Manhattan and light in Brooklyn.

The construction account of the distributing system in Manhattan has, however, been heavily burdened with superfluous salaries in recent years, a special engineering staff being employed at a cost of nearly $25,000 a year for "laying Croton pipes." A standing annual appropriation of $250,000 is imposed by law for this purpose, "including the payment of engineers." While this salary item is proper and reasonable taken by itself, it is but one of many which in the aggregate make the administrative charges of the Croton system more than twice as much pro rata as those of the Ridgewood system.

ORGANIZATION AND ADMINISTRATION.

The water department is organized primarily as a political machine, with the incidental purpose of supplying water to the people of the city. Its physical operation is almost wholly controlled by the chief engineer, whose bureau also exerts a decisive influence upon the operations of the revenue department, which are nominally under the control of the water registrar. The offices of water commissioner and five deputy commissioners are wholly political. The deputy commissioners are wholly useless as well. They have no function whatever in the actual operation of the department, further than to parcel out the patronage connected with it.

The present system under the borough organization, whereby each deputy commissioner is assumed to have the direction of affairs within his own borough, is cumbersome and obstructive, and is a great practical impediment to effective and speedy work in the department. Moreover, it causes friction between the working staffs of the chief engineer and the engineers-in-charge in the other boroughs. The chief engineer has the power of interference without the power of direction. He can and does suppress the recommendations of the engineers-in-charge in other boroughs, and can make recommendations in his own name on behalf of those bor-

oughs, which are not approved by the responsible engineers and are not desirable for the best interests of the service.

As already set forth, the cost of administration in the boroughs of Manhattan and the Bronx is excessively large as compared with that of Brooklyn, due in great degree to an excessive salary list and also to less economical management in construction and maintenance. As a result, the Croton system within the limits of the city, which has cost much more pro rata than the Ridgewood system, is nevertheless in much poorer physical condition and less efficiently administered, not, perhaps, in the delivery of water, but as to keeping the plant in proper repair at a minimum cost. The laxity in this respect appears from the fact that there are no proper records in existence showing accurately the exact condition of the Manhattan distributing system. There are maps which show with more or less accuracy the location and sizes of mains and pipes, but those maps are at no time in complete form, are not readily accessible for reference, and in a word, are not a full and true index to the existing distribution system.

There is a notable absence of records as to the position of water-gates and stop-cocks throughout the city. It is stated by employees of the water department that existing maps do not properly show the position of such water-gates and that many of them are not matters of record, but are known only to certain employees, whose knowledge of them is relied upon to make them useful.

It is certain that the pipes in many miles of streets in the borough of Manhattan are of too small diameter to supply the demand upon them, and are in bad physical condition. The records regarding these details are kept in such slipshod manner that the exact condition and the exact capacity of the pipes in a considerable part of the city are largely matters of guesswork.

Contrary conditions prevail in Brooklyn. Every detail concerning every foot of pipe laid since 1859 is a matter of exact record. The maps of the distribution system are complete, all changes are promptly indicated thereon, they are properly filed and accessible at all times, the time of service of all pipes in every street is shown by the record, the cost of construction, the date and cost of all repairs, and all similar details are fully recorded. The difference in system accounts in a large degree for the greater economy of management in the Brooklyn department.

REVENUE.

The water revenues derived by the city, mainly from the Croton system and the Ridgewood system, are at present about $6,500,000 a year. Of this amount about $2,000,000 is paid by the Ridgewood and $4,500,000 by the Croton system. These amounts are only approximate, certain small revenues from other sources being intermingled with the general water revenues and not readily separable from them.

The revenue is derived mainly from meter charges and from frontage rates, under the latter head being included various special charges based upon occupation and special uses. The meter charges in Manhattan produced about $2,500,000, the rates about $2,000,000, prior to the recent changes in the scale of charges. In Brooklyn about 3,000 meters produced somewhat more than $500,000, about $1,500,000 being derived from rates. The scale of charges in the two boroughs is different. Therefore an exact comparison of revenue is not practicable; but it is certain that the water revenues in the borough of Manhattan are less pro rata, on the basis of population, than those of Brooklyn, and that the water revenues of the former borough are not as efficiently collected as those of the latter.

The records of the water revenues are scandalously defective. It is not too much to say that no records worthy of the name, covering a period of years, are in existence; but a significant test can be made by a comparison of the relative annual revenues and population. Such a comparison is practicable only in the period preceding the general use of meters, when nearly all the revenue was derived from frontage rates.

The revenue from rates alone in the borough of Brooklyn has not fallen below $1,800 a year, for each thousand of the population, since 1871. In 1872 the revenue from rates in the present borough of Manhattan was $1,548 for each thousand persons. The population from 1872 to 1883 increased materially, and from each thousand persons there should have been derived approximately that amount, provided there had been no change in the rate. But there was a change in the rate. In the year 1874, a much higher rate was imposed upon certain important classes of consumers, the members of which had theretofore paid from $50 to $100 per year. Meters were placed in their premises, and their charges were raised to a minimum of $500. In some cases the charge was as high as

$1,900. The city did not get one cent of this increase. For a number of years it did not get as much revenue per thousand persons as it had formerly received, before any meters had been placed. By the year 1883 there had been nearly 6,000 meters placed. The city received from 1874–1883, the period when much higher rates were imposed upon some consumers and when meters came into use, $1,000,000 less than it would have received if there had been no meters at all.

An analysis of the meter revenues from 1879–1899 shows that the averages of consumption by classes, used by the water department as a basis for the collection of the city revenues, are mathematical impossibilities. The existing records of the water department do not supply any satisfactory information upon these matters.

It appears, therefore, that the frontage rates in the former city of New York, before meters were introduced, did not return nearly as much revenue per thousand, pro rata, for population as the frontage rates of Brooklyn; that the introduction of meters caused the city to absolutely lose money for a number of years; that when 6,000 meters had been placed upon the classes of largest consumers, the city still did not get any increased revenue from those higher charges; and that to-day 36,000 meters in operation in the borough of Manhattan yield only four times as much revenue at an equal rate of charge as is derived from about 3,000 meters now in operation in the borough of Brooklyn.

In certain years the meter inspectors, whose duty it is to read the meters and report the records shown thereby, did not look at the meters whose records they reported to the water registrar. Their reports were pure guesswork. For weeks nearly all the inspectors employed by the department passed all their time in saloons and other places, when they were supposed to be at work gathering meter reports. The charges made to consumers were based upon the alleged reports of these inspectors. In certain classes of large consumers the average charges were arbitrarily and largely reduced in a specific year. There have been great fluctuations in the quantity consumed by these classes in the ensuing years, but there has practically been no change in the average charge made to them, nor in the reports of their average consumption. One of these classes represents the greatest average increase in the consumption of water by any class whatsoever and

also the greatest increase in the number of members in the class. There has not been a variation of 1½ per cent since 1881 in the reported average consumption and revenues returned by this class.

The commissioner of water supply states that his records are not kept in such form as readily to permit an examination into the circumstances of these cases. There is no system of checks upon the entries made upon the books of the water registrar nor upon the arrears accounts against consumers. An entry may be readily cancelled with little danger of detection. The system now in use does not provide any means for the discovery of such possible tampering with the books. There can be little doubt but that a better system would produce a much greater revenue from water rates and meter charges in the borough of Manhattan.

ALLEGED INSUFFICIENT SUPPLY.

There has been an extreme shortage of water supply in the borough of the Bronx for several years past, and only the greatest care suffices to make the supply of the borough of Brooklyn meet the ordinary demands upon it. In Brooklyn the visible supply is at all times drawn down to the lowest limits, and an increased quantity is pressingly needed. These conditions have been set forth by the department of water supply with great insistency as reasons for an extension of the water system on a scale that will more than double its present capacity. It is also alleged that there is great waste of water in the borough of Manhattan, whereby the available supply is largely dissipated, without actually relieving the necessities of the population. These postulates rest almost entirely upon the data supplied by the records of the water department. Those records are inaccurate and contradictory and no safe conclusions can be drawn from them. It is absolutely essential that independent and disinterested examination be made of all the facts before any action involving the enormous outlay for new works is taken.

The borough of the Bronx might have had a sufficient supply of water at any time by the outlay of a trifling sum of money. A moderate investment would have completed the now incomplete Ridgewood system by supplying a new conduit to make available collecting works already in existence and providing a filtering plant, which, at very small cost, would utilize several sources now excluded because of their polluted condition.

While the department of water supply has indulged in much clamor over these conditions and has ostensibly sought to have them corrected, the essential steps which would have consummated what was aimed at have been persistently omitted.

The alleged consumption of water by the inhabitants of this city is not demonstrated by reliable proof. The gauges which measure the flow of water through the new aqueduct were misplaced in 1896 and the quantity indicated as passing through the aqueduct since then has been exaggerated to the extent of 10,000,000 gallons per day by the misplacement of these gauges. The statements of quantities of water in the storage reservoirs, the draft thereon, and the depletion are impeached by the contradictory records of the department of water supply. The statements of the quantities of water pumped in the districts where the complaints of short supply have been greatest are equally unreliable. They have been exaggerated to the extent of nearly one-third. All deductions and assumptions as to quantity actually consumed and wasted must proceed from these data, which are in their nature worthless because inaccurate and unreliable. Therefore statements as to consumption and waste are in large degree guesswork, notwithstanding that they may be reasonable in themselves and presumptively true. But scientific inquiries do not proceed upon theories only and mathematical conclusions are not deducible from faulty data.

In the public mind there is a close connection between the alleged insufficiency of the city's water supply and the attempt to foist upon the city the great Ramapo steal. That there is an actual connection between these conditions is certain, but it is equally probable in the minds of those who have studied all the facts, that there is likewise a close connection between the deficiency in the meter revenues, the alleged water shortage and the alleged necessity of immediately providing a greater supply of water and a greater supply of meters. The outlay involved by the proposed Ramapo contract would be a minimum of $5,000,000 per year. When it is considered that the deficiency in the meter and rate revenues is seemingly from $2,500,000 to $3,000,000 a year, the relative importance of the two possibilities will be perceived. Very few persons have had such command of the facts as would enable them to make that comparison, but it is one which should be fully made and in which all the facts should be publicly set forth.

The statements of fact and of presumption embodied in this article rest upon analyses made by Mr. Frederick B. De Berard, from data derived wholly from official sources. Many of Mr. De Berard's deductions have been severely scrutinized, and none have been found fallacious; but he informs me that an absolute demonstration requires an examination in detail of the water-revenue account books since about 1874.

WORK OF THE BUILDING DEPARTMENT.

By Julius M. Mayer.

The Department of Buildings of the City of New York has jurisdiction over the entire consolidated territory constituting the greater city. Prior to the enactment of the charter, the building laws were made up of statutes passed from time to time. These statutes were scattered and in some instances conflicting and in others obsolete. For the purpose, therefore, of providing a compact but comprehensive code, the municipal assembly was authorized to appoint a commission of experts to frame a "building code." A commission having been appointed, such a code was reported to the municipal assembly and having been approved by the mayor, went into effect December 23d, 1899.

This code makes provision for almost every detail in relation to the erection, alteration or removal of buildings. Only those who have had actual experience in building can realize the many details which must be considered in the construction of a building, and the serious consequences which may result from a failure to comply with the law. While some provisions of the building code may be open to technical criticism, it is regarded generally as a satisfactory and practicable codification.

POWERS OF THE DEPARTMENT.

The first step preparatory to the erection of a building is the preparation of the plan and the submission thereof to the building department. These plans often present very difficult architectural and engineering problems, and for intelligent action thereon it is necessary that the department have highly competent architects and engineers in its employ. If the walls are not of the proper thickness, or the carrying capacity of the floors is not properly estimated, or the open spaces not properly arranged, a disaster may occur when least expected. If too much of the lot is to be occupied by a tenement, or if the light and ventilation therein are less than the law requires, the building must sooner or later

become unsanitary. If the aisles of a theatre, or other place of public assembly, are not sufficiently wide, or if there are not sufficient means of ingress or egress, a serious panic may result. And in a thousand and-one other ways, the life and property of the citizen may be jeopardized. To protect the individual, the law requires that all plans, not only for the erection of new buildings but the alteration or removal of old buildings, must be approved by the department before work is begun; that is, the department must decide whether the plans conform to the requirements of the law and the code. Any action without this approval is illegal.

The next step is far more important. The plans may be in strict accordance with law, but unless there is a proper supervision during the erection of the building, this counts for naught. Building material of inferior grade may be used. More of the lot may be occupied than the plan calls for. Inferior plumbing may be installed. As a result the building may become unsanitary, unsafe, and in case of fire a veritable death-trap.

Again the safety and sanitation of every construction whether a private dwelling, a tenement, an apartment house, a theater or other place of public assembly, principally depends upon the vigilance and care of this department. The individual is absolutely unable to protect himself from careless or dishonest builders. Indeed, no department has more to do with the safety, comfort and health of the people.

ORGANIZATION OF THE DEPARTMENT.

At the head of the department of buildings is the board of buildings, which consists of three commissioners appointed by the mayor, each one of whom has administrative jurisdiction in the borough or boroughs for which he is appointed, viz.: the commissioner for the boroughs of Manhattan and the Bronx; the commissioner for the borough of Brooklyn, and the commissioner for the boroughs of Queens and Richmond.

The law vests in the board of buildings large discretion in respect to certain most important provisions. Section 649 of the charter provides that whenever a commissioner rejects or refuses to approve the mode, manner of construction, or materials proposed to be followed or used in the erection or alteration of any building or structure, or when it is claimed that the rules and regulations of the board, or the provisions of any law or ordinance

do not apply, or that an equally good and more desirable form
construction can be employed in any specific case, the owner of t
building or structure in question may appeal from the decisio
the commissioner to the board in any case where the amount i
volved by such decision shall exceed the sum of one thousand d
lars, provided, however, that in the boroughs of Manhattan a
the Bronx such appeal shall be taken to a body known as t
board of examiners. This is a peculiar and anomalous board,
appointed by the mayor or by any city authority, but by cert
trade or professional societies, some of which are active a
well known, and others of which are not. This board of e
aminers has existed for many years and the members thereof
not removable by any municipal authority, but hold office pra
cally as long as the respective societies which they represent appoi
them. The commissioner of buildings for the boroughs of Ma
hattan and the Bronx is *ex-officio* a member of this board of e
aminers.

Section 650 of the charter and section 148 of the building co
provide further that each commissioner shall have power, with t
approval of the board of buildings, to vary or modify any rule
regulation of the board of buildings, or the provisions of the chart
or of any existing law or ordinance relating to the construct
alteration or removal of any structure erected or to be erect
within the borough or boroughs over which he has jurisdiction.

It will thus be seen that there are really two appellate tribuna
in which the officer whose discretion is sought, or whose decisi
is unsatisfactory, sits as one of the judges to consider his own di
cretion or to pass on his own decision which is appealed from.

The decision of the board of buildings or the board of examin
ers, as the case may be, is final and conclusive, and cannot be re
viewed by the courts.

The result is an absence of that direct responsibility which is s
essential to the administration of a department to which is con
fided so largely the life and safety of the public, as well as th
health of hundreds of thousands of persons dwelling in tene
ments, apartments or hotels. So that we have this peculia
and complicated system, namely, that appeals from the decisions
of the commissioner of the boroughs of Manhattan and the Bronx
are taken to a board of examiners of which he is a member, while
appeals from the decisions of each of the commissioners of the

other boroughs are taken to the board of buildings of which the commissioner is a member.

On the other hand, each commissioner has power, with the approval of his fellow commissioners composing the board, to vary or modify the existing code. This is a very great power, and can be exercised by the vote of one commissioner in addition to the commissioner who desires to vary the rule. In other words, two commissioners have functions of the legislature.

It will, therefore, be seen that in these three commissioners are vested tremendous powers, the exercise of which may result in great benefit or great injury. These men should be men of the highest qualifications, independent, keenly appreciative of their responsibilities and thoroughly fearless; and they should also be men who are reasonable and fair-minded, and who upon the one hand have not such pride of opinion or pre-determination that they will not entertain any fair and reasonable application, and on the other hand, who are not so weak that they will succumb to considerations of personal friendship or pecuniary rewards.

OPPORTUNITIES FOR FAVORITISM.

In the conduct of the building department, it is daily possible to cause serious loss and damage to the investor or builder. For instance, a builder buys a plot of ground upon which he is to erect a tenement or other building. He has bought it, perhaps, with a purchase money mortgage. His broker has arranged for his building loan. He is ready to start excavating. The interest is running on his mortgage. But instead of his plans being approved expeditiously, he may be subjected to unnecessary and vexatious delays. Interest is adding to the cost rapidly. The delays may cause the building-loan men to withdraw their offer and place their money elsewhere; and it may be, too, that the price of materials is rising. When he asks why his plans are not approved, he may be met with a variety of excuses; for instance, that it has been impossible to pass upon his plans because of accumulated work, or that some technical detail, which might have been readily corrected, has not been complied with. There is no remedy, no recourse to the courts, no means of showing active malice or culpable neglect; he is simply helpless.

This is but a single illustration of what might happen when

the department is not properly conducted, and serves to emphasize the importance of having the right men at its head.

In addition to the foregoing, there are many materials the use of which may be permitted or prohibited by the board of buildings or of the board of examiners. Fire-proofing materials as substitutes for hollow brick or terra cotta are being introduced in the market from time to time, and many of these substitutes are regarded favorably by architects of ability and responsibility. The building code provides as a condition precedent to the same being used that tests shall be made under the direction and to the satisfaction of the board of buildings. This provision is wise and when the discretion vested by it is properly exercised, no one can complain. If, however, the tests applied thoroughly satisfy impartial and capable judges, but do not satisfy the department of buildings, one manufacturer may thus obtain a virtual monopoly, to the exclusion of all others. The same is true of plaster boards, plumbing and other materials used in construction.

When a builder finds himself oppressed, he has practically no remedy. Of course, he has many theoretical remedies, and there are many things he could do if he had the courage or the disposition. But the difficulty is that he supposes (rightly or wrongly) that if he rebels he will merely subject himself to further trouble and annoyance, and therefore he swallows his indignation and suffers the loss.

On the other hand, if a builder is favored, or if his building does not receive that close supervision which is necessary, he may gain a great advantage over his competitors. But that is by no means the most serious result of favoritism. Hundreds of people who dwell in a tenement are the ultimate and real sufferers from bad construction and unsanitary conditions. They are the ones who suffer from inferior light and ventilation caused by a non-compliance with the law, and who are slaughtered by disease or burned in fires. Indeed, it is the tenement house construction which after all presents the most serious difficulties, and gives the building department the most responsible and difficult work.

EFFICIENCY OF ADMINISTRATION.

The recent report of the Tenement House Commission presents some statistics which will be interesting to those who might

wish to learn in detail to what extent the law has been complied with.

Out of 333 new tenement houses in course of construction which were inspected in the borough of Manhattan, only fifteen were found in which there were no violations of law. In the other boroughs there was no such house found in which there was no violation.

There is probably no provision of the law more important than that which limits the proportion of lot area to be occupied by a building.

Of the 286 tenements where this information was obtainable, 282, or 99 per cent, covered more than 65 per cent of the lot; 274, or 96 per cent, more than 70 per cent of the lot, and 88, or 31 per cent, more than 75 per cent of the lot, the extreme limit of discretion given to the building department. Twenty-nine tenements occupied 80 per cent of lot area or over. These percentages in other boroughs were somewhat less. In Manhattan, out of the houses examined in these particulars, 67 per cent had the floors of their public halls, 97 per cent their stairs, and 58 per cent the walls enclosing their stairs constructed of wood.

The law requires all these parts of the building to be of "slow burning or fireproof construction."

In Brooklyn the percentages were 66 per cent, 100 per cent. and 70 per cent respectively.

DISCRETIONARY AUTHORITY NECESSARY.

It may be proper to remark that while the discretion given to the commissioners of buildings is very large, the vesting of such discretion is absolutely necessary. No code of building laws or regulations can be devised to meet every condition and the necessarily changing and varying circumstances. No one unfamiliar with building can fully realize how plans which were expected to accomplish a desired result sometimes do not work well in practice, and it is proper and just that certain rules and regulations should be modified under these and other circumstances.

In the erection of tenement houses, for example, the commissioner is vested with discretion as to whether the proposed tenement shall occupy over sixty-five and up to seventy-five per cent of the lot; and this provision is necessary because under certain circumstances and surrounding conditions it might be fair and proper, having in view the highest considerations of health, to permit one tenement to occupy seventy-five per cent of the lot, whereas in a more densely populated section of the city, or under different surroundings, it might be unwise to permit the lot to be occupied beyond the extent of sixty-five per cent.

From the general view, therefore, of the duties and responsibilities of this department and of its executive heads, and of the condition of existing law, these conclusions may be briefly stated: First: The system is seriously defective by reason of confusion of authority and the absence of sufficiently direct responsibility. Secondly: Whatever the system of laws may be, the men at the head of the building department should be men of the highest integrity and ability obtainable.

A simple method can be devised to eliminate the confusion of authority. Each commissioner should be vested with complete jurisdiction in the boroughs for which he is appointed. This would make it impossible to escape responsibility except when his decisions have been successfully appealed from. An appeal should lie from his decisions to an appellate body, appointed by the mayor, composed of three or five members, sufficiently large to include representative and practical men. This appellate tribunal should in no other way be connected with the building department, and should have all of the powers which are now vested in the board of buildings and in the board of examiners. Appeals should be heard and disposed of within a week of the time when taken.

Another practicable suggestion is that all plans should be acted upon by the department of buildings within ten days; that is to say, adopted within that time or rejected with the reason for rejection. There may be busy times when such a requirement limiting the time would press the department very hard, but as a general rule, there would be no difficulty in carrying out this provision.

But over and above everything else, the administration of such a department as this depends not upon any law, rule or regulation, but upon the kind of men at its head, and the necessity of selecting men of the right calibre is emphasized by the fact that the building department rarely comes into public view. The police, fire and health departments are constantly in the public mind and have the attention of the people directed to them, but the general public seems to be interested in the building department only when some great disaster happens; and, therefore, while its work really reaches ultimately every citizen, there are comparatively few who come into direct communication with it.

There is no other department in the city in whose executive head is vested so wide and great a discretion, and it may, therefore, be confidently said that the office of commissioner of buildings is equal in importance to that of any other executive office in the municipal government and demands the highest degree of integrity, skill, patience and fairness.

NOTES AND COMMENTS.

CHARTER REVISION COMMISSION'S REPORT.

The Commission appointed by Governor Roosevelt during the last session of the legislature has recently submitted its report, having gone over the entire charter in great detail and having made many important recommendations. It is impossible to give full consideration to these here; it will be sufficient to enumerate briefly the chief features, which are: (1) The substitution of a single chamber of 128 members for the present dual municipal assembly. (2) The extension of its powers. (3) The centralization of administrative responsibility in the mayor by giving him unlimited power to remove most of his appointees. (4) The decentralization of most of the public works excepting the water supply by placing them under the jurisdiction of the borough *presidents* (5) The devolution of the powers of the board of estimate and apportionment and of the board of public improvements upon a single board made up of elected officers. In some respects, the report is admirable, in others it seems very ill-advised.

It is the fashion to denounce the government of the city of New York. An active and sensational newspaper press indulges in this whenever it has opportunity, and Tammany Hall sees to it that the opportunities recur with frequency. While good government is not possible without conscientious and honest agents to carry *it on*, laws may, as we know, minimize the consequences of having inferior men in office. But although there are many bad spots, our New York local government is not all bad. Some competent judges claim, not without reason, that its efficiency will compare favorably with that of any other American city. Certainly Manhattan island had a far better government during the past twenty years than the neighboring city of Brooklyn, and the rumors that come to us from Philadelphia are not calculated to make New Yorkers look in that direction for an improved model.

If we search for the grounds of the chief criticism against the city government, we find that they are (1) in the police department and (2) in particular discretionary acts of certain heads of departments. The condition of the police department doubtless calls for most radical and thorough treatment by the legislature, but it is far from clear that legislation can provide substantial remedies in other respects. Of course, there are very many provisions of the present charter which might be amended with benefit to the public, but except in the organization of the police department the *most* conspicuous defects in our city government do not flow from the provisions of its charter. Granting that the charter can be improved, it was of course the duty of the revisers to search for its deficiencies. But it was as much their duty to seek out what had worked well and satisfactorily, for if some of the persons who have been carrying on the government of the Greater New York during the past three years have not furnished ideal examples of what public officers should be, then so much the more important is it to discover those portions of the charter which work well under such unfavorable *conditions*. It is much more important that the revisers should preserve and hold fast to those parts than that they should seek to remedy evils by changes, the results of which must necessarily be uncertain.

Unfortunately, revisers of charters are always inclined to follow theories and to

undervalue illogical devices although they may have in their favor the fact that they have worked well in practice. For instance, at the time the present Greater New York charter was framed, it was very vigorously discussed whether the bureaus in the office of the then commissioner of public works should be raised to the rank of departments with jurisdiction over the entire city, or whether the administration of the city's public works should be divided according to geographical lines. The former proposition (the one adopted) was the more logical. The latter proposition had in its favor the excellent results achieved by the department of street improvements of the 23rd and 24th wards since the time of its creation in 1890. Notwithstanding the argument from experience, there were created departments of highways, sewers and public buildings extending over the entire city, and the idea of having elected commissioners of street improvements in the different boroughs was abandoned. The present revisers propose to change this and to give to the borough presidents elected by the people control of the public works in their boroughs. This would seem to be a wise return to what, in practice has been proved to be good.

The bi-partisan police board has worked as badly as possible and no one can say that the revisers are not justified in suggesting a change to a single-headed police commission. This change has been already affected by the legislature, through a separate enactment—not however in the same way as the revisers recommend. This plan may not work well, but it cannot be worse than the one for which it is substituted.

But unfortunately, the revisers did not confine their proposed changes to provisions which worked badly. They propose to change what is everywhere admitted to be the most beneficent feature of our city government, the board of estimate and apportionment. This board originated in the days of the late William M. Tweed, and it is said that the purpose for which it was designed was to rob the city of New York, but Tweed builded better than he knew, and instead of proving a menace to the city, it has worked uniformly well under administrations of all kinds. Before consolidation, as at the present time (except for the change in the title of the president of the board of aldermen to president of the council), this board was made up of the mayor, the comptroller, the president of the board of aldermen, corporation counsel and the president of the tax department. It is to be noticed that it is composed of those officials who hold the principal offices in the city government and whose important duty it is to collect and protect the city's money, and that there is upon it no official who has immediately to do with the spending of the city's money and whose interest and official bias is likely to make him favor extravagant appropriations. The chief duty of this board is to fix the budget, but the board has been so successful in gaining the public confidence that other duties have gradually been placed upon it. Still, its character as a body made up without the presence of the head of a department that spends money has been, up to the present time, jealously preserved. Under our former city government the suggestion of putting a commissioner of public works on this board would have been denounced on all sides as tending to destroy its essential character.

But there was need of having certain matters relative to the spending of appropriations and to the planning of public works passed upon in consultation with such officers as the commissioner of public works and the president of the park department, who spent the money appropriated by the board of estimate. This gave rise to the board of street openings and improvements, which, before consolidation, was composed of the mayor, comptroller, commissioner of public works, president of the department of parks, and commissioner of street improvements of the 23d and 24th wards. When the powers of this board were devolved by the new charter upon the board of public improvements, the new board was given much more control over the different depart-

ments represented upon it than there was any occasion for under the former city government, and its membership was very much increased. But in the new charter the character of the two boards was retained: the one composed of the officers that protect the city's money; the other composed of the principal officers of the city, including the heads of the departments that spend the city's money.

All this is ignored in the proposed revision, and the plan is to consolidate the board of estimate and apportionment and the board of public improvements, and have a new board called the board of estimate and apportionment composed of the mayor, controller, president of the board of aldermen and the five county presidents. As the borough presidents are, under the revision, to perform the functions of the commissioners of public works, of the commissioners of street improvements of the 23rd and 24th wards, and a part of those of the park department under our former city government, it will be seen at once that this new board so far as its personel is concerned is the board of street openings and improvements, with the addition of the president of the board of aldermen.

In doing this the revisers have gone counter to all that is best and most successful in the city government for the last thirty years. They would preserve the name of the board of estimate and apportionment, while actually abolishing it and would retain under a false title the board of public improvements. Called by any other name the board of estimate would doubtless be equally effective, but a board including a different class of officials who have different official prejudices and interests in the city government, and whose exclusion from the board of estimate has heretofore always been insisted upon, though it be called the board of estimate and apportionment, cannot be expected to work in the same way.

Before considering the grounds upon which this radical change may be excused or defended, attention should be called to one other feature of the proposed revision. The revisers have undertaken to increase the numbers and extend the powers of that part of our city government which has given the least satisfactory results. I refer of course to the board of aldermen—that ancient institution brought to us from England to which we have clung with unexampled fidelity in spite of its continued failure in our American cities. The faith of charter makers in boards of aldermen furnishes an interesting psycological study. Whenever a commission is appointed to revise a charter, the power of the board of aldermen is increased. Its use of its increased power invariably fails of appreciation by the public, and gradually its powers are taken from it until the next general revision, when they are given fresh opportunities. Like all revisers, the ones whose work we are now discussing have increased the powers of the aldermen. They have also increased their numbers. This has been done in the face of the record of obstruction and inefficiency built up by the present board during the past three years, to say nothing of the record of the board throughout the whole municipal history of New York city, and the record of similar boards in other cities throughout the country.

It is generally understood that this increase in the membership of the board is due to the desire on the part of the revisers to give increased power and functions to the boards of local improvements. These boards of local improvements were one of the concessions made to the theorists in the original charter, but as it was well realized by the practical men composing the old charter commission that the aldermen elected in the city of New York were not exactly the body to whose knowledge, skill and integrity ought to be committed the control of all public improvements, the powers of these local boards were confined to recommending. As they stand in the charter to-day it is difficult to see what good purpose they serve. Indeed, although the proposed revision

contains some changes of importance when dealing with these local boards, they seem still to be quite superfluous, for although the language used for the purpose of excluding them from actual power might be more explicit, and to that extent, more encouraging to the property owners liable to be affected by public improvements, it is clearly intended that the acts of these local boards must be approved not only by the borough presidents but also by the board of estimate and apportionment, before they can operate to inaugurate public improvements. The difference then between providing that the local board may recommend public improvements, as is now the case, and providing that it may initiate public improvements, as is proposed, is not very great, excepting in so far as public improvements may not be undertaken, under the new scheme, without their initiative. If the aldermen in the local boards are to have the power to hold up improvements desired by the borough presidents, their power for evil will be large, and they will to a great extent nullify the advantages of the increased powers given to the borough presidents by relieving them of responsibility. In the borough of the Bronx, between 1890 and 1898, Commissioners Heinz and Haffen, were absolutely responsible to the people who elected them for the administration of their department, and for the results achieved, excepting so far as the boards of estimate and of street openings might refuse their assent to their propositions. It is contrary to all experience in city government to suppose that Mr. Haffen would have been facilitated in the work of his department by the assistance of the aldermen from the 23rd and 24th wards. Doubtless h was kind to them and out of the abundance of his affection appointed men to office at their suggestions whose services were not always a benefit to the public, but mistakes of this kind certainly occurred with much less frequency than would have been the case if the aldermen were in a position to hamper him and interfere with the workings of his department.

It is argued that without local representation on the board of estimate the less populated boroughs will fail to secure adequate appropriations for public improvements. But the past history of the city does not lend support to any such idea. It is, of course, notorious that under the old city government, the present borough of the Bronx (then known as the 23rd and 24th wards, or the annexed district) received the step-child's portion so long at it was under the jurisdiction of the park department. But as soon as it got its own department and an elected commissioner of street improvements, it had no difficulty in getting all the public improvements it wanted. From the year 1890 until consolidation in 1898, a larger expenditure of public money for schools, bridges, sewers, streets and other public improvements, in proportion to its population, and to the assessed values of its taxable property, was made in the 23rd and 24th wards than can be shown in any other municipality in the world during a similar period. The difficulty of the unimproved suburbs is not with the budget but with the distribution of the appropriation by the heads of the departments. By the proposed establishment of the borough system for public works, experience shows that there would be no difficulty in securing public improvements for the outlying territories of the city. Our policy with respect to public improvements has always been to collect at least a part of the cost from the neighborhood by special assessment for benefit. A willingness to become liable to such assessments furnishes a guaranty of the need of any particular improvement, and the experience of the 23rd and 24th wards shows that under such circumstances the city government will not be niggardly in contributing a share of the cost of the more important works and by the erection of school houses, engine houses and other institutions for which no assessment for benefit can be laid.

It is said that the president of the tax board and the corporation counsel cannot act independently on the board of estimate and apportionment if the mayor has the

power to remove these two officers, and therefore they must be put off the board. This reason for removing these two officers from the board of estimate and apportionment is not adequate, particularly as the mayor, under the new plan, is given three votes. But is it so necessary that the mayor should have the power of removing the corporation counsel and the president of the tax department? Why should not these officers be excepted from the general powers of removal? There is no advantage in slavish adherence to the general principle that the mayor should in ordinary cases possess this power when anything is to be gained for a specific purpose by withholding it from him. Even the proposed revision of section 95, which gives the mayor general powers of removal of his appointees, excepts the members of the board of education and certain other officers for whom the revisers desired a more independent position in the administration of their offices than they would have if the mayor had the absolute power of removal at any time. Again, I point to the past history of the city of New York and ask for a single instance during the whole of the last century where any mayor has quarreled with a corporation counsel appointed by him or with the head of the tax department appointed by him. These officers, particularly the corporation counsel, are thrown so intimately with the mayor in their regular official work that they are invariably on the mayor's side in all controversies and have always worked in harmony with him. If the mayor has the power during the first six months of his term of putting his own appointee in each of these positions, and if it is considered that service on the board of estimate and apportionment is incompatible with leaving the mayor the power to remove them without cause at any time, then except these two officers from the general powers of removal by the mayor, as members of the board of education and others are excepted from the general powers. When there has never been a case of lack of harmony between the mayor and the corporation counsel, when the functions that they perform in the city government are not of a kind to make it likely that the mayor would ever need to use this power of removal without cause, can it be seriously contended that it is important enough to give the mayor this absolute power of removal at the cost of doing away with the board of estimate and apportionment?

I am one of those who deprecate the tendency which many persons interested in municipal reform evince, to look for their models to foreign cities. It is not enough that foreign cities, seem to be better governed than American cities to warrant us in seeking to copy their systems and methods of administration. The relations of the citizens to the city government, and of the city government to the central government, and the incidence of taxation, are in most cases so dissimilar that it is not safe for us in this country to follow the way in which foreign cities accomplish their good results without using the utmost caution. Far better does it seem to me for us to examine what we ourselves have developed, and where we find devices and methods which have grown out of our own institutions which work for the public interest, and which through many years have proved satisfactory and capable of meeting the ends for which they were designed, to seek to perpetuate them. Unless the weightiest reasons exist for changing what has been demonstrated to be good, let us pause before destroying it.

HENRY DE FOREST BALDWIN.

ADVERTISING AND ADVERTISERS.

In his article "Advertising Run Mad" in the June number of MUNICIPAL AFFAIRS, the writer of this review endeavored to throw aside—since he considered them mistaken—the prejudice against scenic advertisers and the assumption of their greed, bad taste, and general depravity in defacing alike the best work of God and man; and

he was at some pains to point out, not merely that shining representatives of the so-called "cultured classes" were responsible for some of the more flagrant sins against propriety, taste and decency in this regard; but that from even a hasty survey of the situation, it was plain that gentlemen with every motive to be on their good behavior towards the public had found that public acquiescent in, and presumably pleased with, what a few of us thought, and a great many of us professed to think, was vulgarity in one of its most offensive and least excusable forms.

It was cheerfully conceded—in fact was the basis of the article—that this world was neither made, nor should be managed, for the special delectation of a few, however worthy or cultured these few might be; but that, in practice, if people in general like or tolerate the spoiling of nature or architecture by advertising, then that we must stand it, and probably ought to do so—the obvious conclusion being that it was certainly not against the bill-poster, and sign-painter, and in but small measure even against his patron, that the maledictions of outraged taste should be directed. It was rather urged that those of us who had sufficient faith in the logic of our taste to press it upon the public, would do well to demonstrate this by getting the public to see it in the same light as ourselves; in which case our cheerful conclusion was that the wrong—if it be one—would right itself. The advertiser of the Twentieth century would then cater to its cultured public, and avoid its resentment by eschewing all advertisements except those which, being things of beauty, should be an adornment to the world and a joy forever to their customers.

It was therefore with regret that we received numerous suggestions from those who misunderstood the article as an attack, not merely upon sign painters and advertisers, but upon such estimable gentlemen as the owner of the Windsor Hotel site; such a high priest of culture as that the union of whose art with billboards we photographed; such champions of hygiene as our friend of the fifty-seven foods, running the gamut from beans to pickles; and the next-to-noble gentleman whose tea in Ceylon, yacht in Great Britain, and pork deals here are each famous; and this regret was not lessened by the fact that in every case the writer approved of what he had misunderstood as an attack, and urged us further to smite the Philistines who thus misrepresented culture.

In each case, however, we pointed out our correspondent's mistake and asked him to re-read the article—which may account for the fact that we recall no second letter from any such. So much moved, however, have we been by the evident need of a defender of the representatives of culture in question, not from us but from those who had misunderstood us, that we queried whether it was not our duty to write a second article in which more full justice should be done their position.

We are happy, however, to have been relieved of this responsibility by the publication, *Profitable Advertising*, which, using as it does the most unexceptionable of paper, neatest of type and most intense of literary and business zeal, is fit in every way to speak for those interested in the honorable calling which it represents.

That, in some particulars, its editor also misapprehends us does not detract from his representative qualities, especially since he has rightly understood us on some points, and agrees with us upon the main one. He is right in charging that we quote with "evident relish" the reported announcement of Switzerland's legislative body, that it would "no more allow these advertisements on our rocks than on the white cross of our flag"; and possibly so, from his standpoint, is his contempt for this sign of our weak mind. He was mistaken in suggesting that we said "Many dictinctly uncomplimentary things about the avarice of the modern advertiser"; we challenge him to point

out any such unkind—not to say unjust—allusion. And we fear that he is so nearly correct as scarcely to be subject to criticism in his statement that—

> For years a certain class of so-called reformers have assailed the billboards with all sorts of rhetorical missiles. But we are as yet unable to perceive any diminution either in number of boardings or in the results that accrue from their judicious use.

Again, our minds meet perfectly on his suggestion—

> True, from an æsthetic point of view, the advertiser is prone to carry the matter of billboards and signs to a regrettable extreme.

And we are also glad that he meets us half way by admitting—

> Personally, we like to look upon Nature unadorned by the hands of man, for 'tis thence that she undoubtedly is adorned the most.

All this, however, is immaterial compared with the assent he gives to our main proposition; all the more valuable, coming, as it does, from an expert, who has had every cause to study the matter from a standpoint so remote from our own. We quote—

> Moreover, since the truth is self-evident that the face of a country is the property of its people, it follows that the people have the billboard matter in their own hands. When the masses raise their voices against this form of advertising, which they have not yet done, it will soon be dropped, because it will then be no longer profitable. But so far as the handful of alleged reformers is concerned, they might just as well cease their futile attacks and permit the people to run the country to suit themselves.

Nothing could be more fair or more consistent with our own ideas of propriety.

MUNICIPAL AFFAIRS will certainly continue its propaganda among the masses, as well as its efforts to touch the æsthetic sense of the more distinguished perpetrators, patrons and beneficiaries of vulgarity, whom we have named. Meanwhile we shall rest in the assurance that, as soon as we shall have made sufficient progress to indicate to our practical brother of *Profitable Advertising* a public preference of good taste, he will promptly give himself the luxury of co-operating in the work—alike to his profit and pleasure, steadfast and unquestioning as are he and those of his gentle trade in the principle so neatly put by the first gentleman of old Rome:

Omne tulit punctum qui miscuit utile dulci.

JOHN DEWITT WARNER.

MUNICIPAL PRINTING IN BOSTON.*

The Department's printing plant was established March 1, 1897, and has therefore been carried on for four years (nearly). * * *

Finding these differences between the facts and the published figures, and, moreover, noting the great difficulty of interpreting the present form of report—which, while displaying excellently the details for comparison with the city auditor's accounts (which is, of course, necessary and proper) does not contain a clear and comprehensive summary of the year's results, which is the thing most important for a report of this character to show, in order that members of the city government and the taxpayers may readily understand the figures and be able to draw correct deductions from them—I have, therefore, considerably changed the form of the report. * * *

RESULTS.

The results of these tabulations are as follows:

[* This article is the gist of a report made to Mayor Hart, under date of February 23, 1901. Much has been written pro and con about this experiment in municipal activity. We now have for the first time an authoritative statement based upon a careful and complete examination of the plant and its finances, Mr. Chase having audited all the books and accounts.—EDITOR.]

1897–98.

Total receipts from the business	$127,601 66	
Total expenses (excluding plant, but including depreciation—10 per cent of cost)	132,716 87	
Deficit or loss (first year)		$5,115 21

1898–99

Total receipts	$147,484 48	
Total expenses	144,655 25	
Gain (second year)		2,829 23
Net loss (two years)		$2,285 98

1899–1900.

Total receipts	$137,451 06	
Total expenses	140,973 23	
Deficit or loss (third year)		3,522 17
Total loss for three years		$5,808 15

1900–1901.

Total receipts	$153,972 70	
Total expenses	170,012 65	
Deficit (fourth year)		16,039 95
Total loss for four years		$21,848 10

FIXED EXPENSES.

In considering the above results, it must be remembered that even if there were no printing plant, the city would be (had previously been) obliged to appropriate money for a superintendent of printing, to receive bids, etc., from private contractors for the printing, and also carry on the postage department (now a part of the printing).

The expense of this work—superintendent's salary, clerks, stationery, expenses, etc.—would figure about $6,500 per year, probably, and if allowance of this amount is made for the four years above (viz.: charge $26,000 to appropriations account instead of expense account) the results of the period would be as follows:

Total receipts for the four years		$566,509 90
Total expenses	$588,358 00	
Deduct for fixed expenses (as explained above)	26,000 00	
	$562,358 00	
Also item	1,330 11	
		561,027 89
(Which is the balance of various items entered twice, and other corrections in the first three years' accounts.)		
Apparent profit from operation for four years		$5,482 01

CAPITAL INVESTED BY THE CITY IN THE PLANT.

I have divided the appropriations made during these four years into two kinds, viz.: (*a*) "*Capital appropriations*," which consist of the $40,000 originally appropriated

to purchase the plant in 1897, and $10,000 appropriated for *Working Capital* in 1899: *total of* $50,000 which would correspond to the capital account of a private concern; and (*b*) Ordinary appropriations for expenses, etc.

This "capital appropriation" may be considered as loaned by the city to the printing plant, and the latter should earn interest thereon (enough to pay at least the rate the city has to pay on its bonds), and also should earn enough additional to create a sinking fund, which would pay off the loaned capital in a reasonable number of years (say twenty).

If we figure this interest charge on $50,000 as 4 per cent per year, the total for four years would be	$8,000 00
And if the payment to sinking-fund be taken at $1,500 per year, the total for four years would be	6,000 00
Making a total *to be deducted* from the apparent profits from operation	$14,000 00
These profits (as above) being only	5,482 01
We have as a practically deficit upon the operation of the plant for four years	$8,517 99

Or a *net loss* of $2,129.50 *per year*.

* * * *

COST COMPARED WITH CONTRACT WORK.

All of the figures so far given have been based on the prices charged by the printing department to the other departments for their printing and to the appropriation account for city documents.

It is, therefore, apparent that if the departments have been paying more than would be charged by outside private contractors for the same work, then these apparent profits to the city may be wholly fictitious, and the fact be that a heavier loss has occurred from the operation of the plant than has been already set forth.

On the other hand, if these prices are less than outside contractors will accept, then the city would have made greater gains (or rather less losses) than those stated.

It is, of course, probable that the first alternative is the true one, rather than the second. Some of the reasons for such a conclusion are: Shorter hours of labor for the same, or higher wages; extra expenses for unnecessary men; difficulty of disciplining the employees and getting the work done as rapidly and economically as in a private plant, etc.

On the other hand, it is doubtless true that a plant such as this one, with all the presses, type, rules, etc., especially designed to handle the regular work of the city, would save money (other things equal) over a private plant not so well fitted and arranged, and as the printing required by the city is now greater than ever before, and contains many half-tone illustrations, etc., which add to the cost very materially, it is quite a problem to decide whether or not it would be to the city's advantage to dispense with the plant entirely and rely upon private contractors, as was formerly done.

Also against the expenses and losses to the city should be credited whatever benefit there has been to the various departments by having their work done at the municipal plant, which might arise from quicker completion of work, due to better facilities, better quality of printing, paper, etc., and better opportunities for corrections and additions by the departments of their original copy furnished to printer, provided, of course, that the facts agree with the above statements. So far as I have been able to determine, there is considerable difference of opinion among heads of departments, some being satisfied with the work and others dissatisfied.

Another and more evident merit of the municipal plant is the direct benefit to the employees therein, whose hours of labor have been shortened, holidays granted, and wages increased. This consideration is an important one, and one to be highly commended and continued, but the good results of such a policy should, of course, be made evident in the financial results of the plant, which can scarcely be said to have been the case by the present showing, or else in the marked improvement in the work done for the departments over that which would be done by less fortunate workmen in private concerns.

CONCLUSIONS.

It is evident that the municipal printing plant has not had the financial success which was anticipated when the plant was established in 1897, and it is further evident that unless a marked improvement is made in the results, the plant must necessarily be dispensed with and the city printing handled by private contracts as formerly.

This would be a public misfortune, but, in my opinion, it can be avoided only by a rigid adherence to business principles in the management of the plant, including the appointment and removal of employees. There is no doubt in my mind, after a careful examination of all the circumstances, that fifteen to twenty per cent of the expenses of the department would be saved, if the pressure of political influence in favor of applicants for positions were wholly removed, and the superintendent left entirely free to run his department as a private business is carried on, appointing experienced and capable employees only, and purchasing his materials wherever they can be bought at the lowest prices.

The present management is, I believe, endeavoring to do this and has the encouragement and support of the mayor, but the absolute necessity for greater efforts in this direction is clearly evident from the figures submitted above.

If it is decided to continue the operation of the plant for another year the results should be watched carefully. During this time the expenses should be markedly reduced, and the charges for printing to the departments should be made, so far as possible, upon the exact basis of outside printers' charges for the same work (without allowance for the extra labor required by shorter hours at the plant), then the actual deficiency which the municipal plant causes can be correctly understood and proper action can be taken.

With the plant run as a business solely for the benefit of the city as a whole, there is no doubt in my mind that all expenses can be paid, the cost to departments reduced, and a profit shown by the plant sufficient to pay the interest upon its capital and accumulate a surplus or sinking fund, sufficient to ultimately reimburse the city for the capital expenditures in the plant.

Such a result will require marked ability and independence in the management and due forbearance on the part of all others from interference with the business of the city's printing.

HARVEY S. CHASE,
Public Accountant and Auditor.

BOOK REVIEWS.

CHICAGO STREET RAILWAYS.

Report of the Street Railway Commission to the City Council of the City of Chicago. December, 1900. 8vo, 186 pp. Paper.

The Street Railway Commission of Chicago was created December 18, 1899, by a resolution of council which authorized the mayor to appoint seven members of that body to investigate and report with reference to the feasibility of municipal ownership and the conditions upon which it would be wise to renew the existing grants of franchise which will soon expire. The report under review was transmitted to the council in December, 1900.

The task of the Commission was the formulation of a policy based upon a series of thorough investigations of the street railway system of Chicago, which culminated in the Harlan report. The present report has taken shape in the draft of a comprehensive "Act in Regard to Street Railways" and in certain recommendations with reference to the terms of franchise grants to be made by local authorities under the general provisions of the state law. The discussion of the policy which is thus outlined reveals a thorough knowledge of the experience of American and foreign cities and careful consideration of the most advanced theory of local transportation. The Commission has taken a broad view of the public interests involved in the management of street railway systems. Nevertheless its recommendations are on the whole distinctly conservative in tone.

In framing the act for the regulation of street railways, the Commission wisely recognizes the principle that transportation policy should be largely determined by local conditions. It declares that the purpose is "to confer upon the municipality the power to work out such a solution of the street railway problem as may best suit its inhabitants, without, however, conferring upon the present generation the power needlessly to tie the hands of succeeding generations."

The Commission first calls attention to the inevitable failure of competition in the street railway field and urges the frank recognition of monopoly. As it does not favor the public operation of railways, it proceeds to wrestle with the difficult question of public control. The act provides for this control through the local council, which is given sweeping power "to make all such regulations as may be needful to the securing of sufficient and adequate service and accommodation for passengers." The Commission recommends that the administrative machinery of control shall be under the direction of a standing committee of the city council.

The duration of franchise grants is fixed in the act at a maximum period of twenty years, but the Commission views with approval the Massachusetts system of indefinite term grants. The report cites the experience of Massachusetts and Washington, D. C., and marshals the well known arguments in favor of such grants, but the Commission is evidently afraid of getting so far ahead of its public as to lose its leadership and so declares that the indefinite grant "would mark such a radical departure from present policy that the Commission has hesitated to do more than commend the idea to public [illegible]." As a compromise measure, it proposes that franchise grants contain a pro-

sion giving the city the right to terminate the contract at the end of every five year eriod.

The Commission favors municipal ownership of tracks, but does not believe that linois is ready for public operation. But in recognition that this is a matter for local etermination, the act provides that cities may acquire railway property, and that any ity may undertake the operation of railways upon the approval of four-sevenths of the oters. In the event of the construction or purchase of street railways the general credit f the city shall not be pledged, but bonds may be issued on the basis of a fund derived rom the lease or direct operation of the railways.

The principle of popular referendum on street railway questions is given generous recognition. Not only is the question of municipal operation to be submitted to the voters, but any ordinance conveying franchise grants must be thus submitted if ten per cent of the voters petition for such action. Moreover, the authorities may resort to the referendum on "any proposition relating to street railways," and they must seek the popular approval of any ordinance which attempts to establish competition with an existing company.

The recommendations of the Commission for securing publicity of accounts are admirable. The act is minute in its specification of the information which must be furnished under oath. The Massachusetts law has been accepted as a model, but the state auditor instead of the railroad commission is given supervision of the accounts. There is provision also for direct financial supervision of the system of each city by the municipal authorities.

A remedy for over-capitalization is sought in the restriction of the issue of stocks and bonds to a par value not more than twenty-five per cent in excess of the actual value of the property of the company. To administer this provision, the act creates a board composed of the state auditor, the state treasurer and the attorney general, who must pass upon all proposed stock and bond issues.

With reference to labor the Commission lays down the sound principle that "fair treatment of street railway workers is demanded by the public primarily as a means of securing efficient and continuous service." To secure this, the Commission suggests compulsory arbitration for all labor disputes, but the details of the plan are reserved for later report.

The Commission sets forth the fact that owing to the independent operation of lines in different parts of the city, Chicago has the zone system of fare in its most perverted form. But it dodges the difficult question of the regulation of fares and the relation of rate of fare to compensation by remarking with solemnity and with evident truth that "the whole question of fares needs overhauling and study."

The report after some very general suggestions on motive power, subways, coordination of service and a non-commital section on legal questions involved, closes with an appendix. And herein the tail comes dangerously near wagging the dog. The report exclusive of appendix covers seventy pages; the appendix covers sixty-six pages. This full appendix opens with a letter from Dr. M. R. Maltbie outlining briefly but clearly the general principles which should be regarded in framing a street railway policy. This is followed by a suggestive paper by Mr. George E. Hooker, on "Public Policy concerning Rapid Transit." Two views of municipal ownership and operation are presented through articles by Albert Shaw and Professor J. Laurence Laughlin, reprinted from the *Independent*. There is also a full extract from the report of the Massachusetts committee of 1898 which is cited so frequently by the Commission. And finally there is a valuable and timely paper on the "Paris Subway System," by Professor Edmund J. James.

The Commission has presented in this report a programme which establishes a sound general policy in street railway matters. In the recent struggles against the attempts of the street railway corporations to extend existing franchise grants, Chicago has shown a degree of intelligence and of vigilant determination to safeguard public interest which few great American cities have yet exhibited. If her enlightened citizenship secures the adoption of the policy of the Commission, Chicago will be in condition to deal successfully with the puzzling problems of local adjustment of fare and conditions of service which the early expiration of franchise grants is now forcing upon her attention. FREDERIC W. SPEIRS.

Philadelphia.

STATISTICS OF CITIES.

Statistics of Cities. Published in the September issue of the Bulletin of the Department of Labor, 1900, pp. 916–1014.

This is the second annual compilation of municipal statistics, the first having been published by the same department a year before. The statistics cover a wide range of subjects as may be seen from the following table of contents:

Table I.—Population, area, period covered, etc.

Table II.—Police, retail liquor saloons, and arrests, by causes.

Table III.—Firemen, fire equipment, and property loss from fires.

Table IV.—Marriages and births.

Table V.—Deaths, by causes.

Table VI.—Percentage of deaths from each specified cause.

Table VII.—Death rate per 1,000 population.

Table VIII.—Area of public parks, and of streets paved, by kind of pavement.

Table IX.—Care of streets, disposal of garbage, and food and sanitary inspection.

Table X.—Public schools and libraries.

Table XI.—Charities: Almshouses, charitable homes, etc., orphan asylums, and hospitals.

Table XII.—Cost of water, gas, and electric-light plants owned and operated by cities.

Table XIII.—Debt, basis of assessment, assessed valuation of property, and taxation.

Table XIV.—Income from all sources.

Table XV.—Expenditures for construction and other capital outlay.

Table XVI.—Expenditures for maintenance and operation.

Table XVII.—Summary of income and expenditures.

Table XVIII.—Assets.

Table XIX.—Per capita debt, assessed valuation of property, and expenditures for maintenance.

The present report covers but 129 cities (although it should have been 185) as against 140 last year, since Congress authorized an inquiry only for cities with a population of not less than 30,000.

With but few exceptions the subjects treated in these tables are the same as last year, but where changes have been made they show a marked improvement on the original plan. Thus we have the addition of an entirely new table containing statistics of marriages and births which was lacking in the first report; the table contains totals of marriages and of births by sex, birth-rate per thousand, and number of still-births. Table IX relating to "care of streets" has been enlarged by the addition of the item of

"food and sanitary inspection," under which are given the numbers of food and sanitary inspectors in each city.

Table XIV has been enlarged by adding the incomes received from water works, gas-works and electric light plants. By far the most important addition, however, next to the table on marriages and births, if not equally important to it, is Table XIII, Assets. In the first Report the assets were given for each city in one lump sum. In the present Report the subject occupies a separate table, in which the assets of each city are given under 56 heads, such as schools (land and building, apparatus, etc.), fire department (in a similar manner as schools), police department (ditto), city hall (ditto), libraries (ditto), parks (ditto), jails, hospitals, markets, bath-houses, water-works, gas-works, cash in the treasury, etc., etc. Under "Charities" the report contains now not only data for municipal institutions, as was the case last year, but also "private and semi-private institutions . . . open to those unable to support themselves." The same is true of the table giving statistics of libraries where, in addition to municipally owned libraries, are given "all of the libraries that are open to the public or a specified class of the public, except church and sunday-school libraries and libraries conducted wholly for profit." The wisdom of the change will be apparent when it is stated that in last year's report Greater New York figured as having only one library with a total of 16,241 volumes, when the Astor Library alone, which is to all intents and purposes a public library, has nearly half a million volumes.

It is to be noted with great satisfaction that the improvements suggested last year by the editor of this magazine in his review of the first report[1] have all been carried out. Thus, the cities are now arranged in the order of the size of their population, instead of alphabetically, as before, and the date of incorporation has been made to apply uniformly to the first incorporation, subsequent reincorporations being indicated in each case in a foot-note. To obviate the discrepancies between the number of arrests and convictions, also noticed in last year's review, the item "Convictions," in Table II, relating to police and arrests, has been dropped, since only "in a few cases it was found possible to secure these data, but in most cases no accurate information could be had on this subject."

A few further suggestions may be now in place. In Table X the total number of pupils and their average daily attendance are given under two heads: "high schools" and "other schools," and Col. Wright finds it necessary to add by way of explanation that "the low average daily attendance in a few of the cities is accounted for by the fact that there are several night schools having a large membership, the attendance being very irregular, and the schools being in operation only a few months during the year." It would seem that such an average is about as meaningless as were the averages given in the early state reports on labor statistics, where the wages of men from superintendent to floor-sweeper, and of women and children were thrown together to obtain an "average." In view of the fact that the night schools are attended largely, if not exclusively, by the adult foreign born population, the statistics of enrollment and attendance in those schools acquire an importance and significance of their own, and should be presented separately, the more so that they are accurately kept, as a rule, by the boards of education of each city and can be inserted without great difficulty. Incidentally that would lend more accuracy to the statistics of the day schools.

Another suggestion is in connection with death rate figures. Both the first and second Reports give "official" death rates which are calculated on the basis of population "as estimated by the health officers" of the respective cities. The census taken

[1] Cf. MUNICIPAL AFFAIRS, 3:747-748.

last year, has enabled the editors of the Report to add a column of death rates calculated on the basis of the census population. "In some cases," it is remarked, "the do not differ greatly from the figures used by the health officers themselves." That depends on what we mean by the word "greatly." There are nine cities in which the difference between the two rates is from three to four deaths per thousand, which is equivalent to an error of more than 20 per cent (*e. g.*, official rate 15, actual rate 18, error about 17 per cent). In the following twelve cities the difference exceeds four units per thousand :

City.	Difference.	City.	Difference.
Atlanta, Ga.	6.47	Dallas, Tex.	4.78
Nashville, Tenn.	6.81	Augusta, Ga.	6.43
San Antonio, Tex.	5.15	Mobile, Ala.	5.73
Norfolk, Va.	6.48	Galveston, Tex.	7.90
Houston, Tex.	8.18	Knoxville, Tenn.	4.34
Covington, Ky.	4.94	Butte, Mont.	7.79

It is worth noting that the greatest discrepancies occurred in southern cities, but there are numerous cases of northern cities with discrepancies from 1½ to 3 points. Most of the official errors, too, were in assuming a larger population than actually existed, thus making the death rate appear smaller than it really was. Of the 127 cities reporting death rates, 90 erred in favor of a minimized death rate, while only 37 exaggerated it. Such inaccuracy makes comparison of death rates from year to year and between city and city well nigh impossible, and it is to be hoped that some way will be found for introducing a factor of correction similar to the one used in the Registrar-General's report from Great Britain.

The Department of Labor is to be congratulated with having carried out so difficult a task with so much accuracy and care as it did, thus laying the foundation for a more comprehensive compilation of municipal in the near future.

New York City. N. I. Stone.

MILWAUKEE CONFERENCE OF NATIONAL MUNICIPAL LEAGUE.

Eighth National Conference for Good City Government. Proceedings. Published by the National Municipal League. Philadelphia, 1900. 8vo, 286 pp. Cloth, $1.

The Eighth National Conference for Good City Government was held at Milwaukee, September 19, 20 and 21, 1900. There were seven sessions besides the banquet. Among the prominent speakers may be mentioned Rev. Washington Gladden, Comptroller Coler, Chas. J. Bonaparte, Hon. William Dudley Foulke, Dr. Milo R. Maltbie, Prof. Frank J. Goodnow, George C. Sikes, Secretary of the Chicago Street Railway Commission Hon. Clinton Rogers Woodruff. The volume under review contains the proceedings in full, including the eighteen formal papers presented and the subsequent discussions, the banquet speeches, business transactions and annual official reports.

It appears that the League has an annual expenditure of about $3,500, half being borne by contributions. The small sum received from the sale of "Proceedings" ($228) indicates that libraries and teachers, as well as students of municipal politics, do not yet understand how important are the contributions contained in these annual publications. That interest in the work of the League is rapidly growing is shown by the statement of the secretary that the 45 municipal reform associations of 1894 have now increased to 468 which devote all or a part of their time to the study of municipal problems. One most significant fact is the general active interest now being taken by business and financial organizations in reconstructing municipal politics. Thanks to the co-opera-

ion of these various civic organizations, the year 1909 was notable for the progressive measures adopted in various states and cities, resulting in the partial adoption of the League's recommendations with regard to charters, primary election laws and control of public franchises.

The progress of the League in organization and unity is indicated by the character of the papers presented. At the earlier sessions a great deal of time was devoted to reports from various cities whose problems were treated as local and isolated. Inductions have since been made, the League has furnished opportunities for organizations in every part of the country to compare notes until now they seem to have recognized that each city has to deal with a national problem and with universal social laws. For instance, discussion has turned from bosses to bossism, from railway companies to franchises, from local boodlers to the commercial spirit in politics, from criticism to construction. The present volume contains hardly a doubting negative tone. The facts presented emphasize past successes, the theories point to constructive statesmanship.

Four general subjects were discussed from various points of view, viz.: The Municipal Program, The Relation of Public Service Corporations to City Government, Primary Election Reforms and Uniform Municipal Accounting. The first group of papers served rather to introduce the National League to the Wisconsin audience and to interpret its Program in the light of local needs. Dr. Sparling pointed out the needs of arousing interest in the civil government of the small city with a population less than 25,000. He recommended the extension of the home rule principle to the smaller units whose "numerous and divided needs, low tax valuations, and low social vitality, present a problem whose solution is farther in the future than that of the larger city." Mr. McAneny urged the extension of civil service regulations as the essential check upon the powers of the mayor, given in the Municipal Program. From New York experience he showed that it was quite as necessary to provide against arbitrary removal and unregulated "exceptions," as against political appointment to office.

Commercialism in Politics, its cause and its remedy, was the second general subject and the one which received most attention at the discussions and at the banquet. Mr. Coler suggests that our material progress has been the nursery of our gravest dangers. The politician has had in his hands the disposition of valuable franchises. When favors are for sale, buyers can always be found. The politician has dickered and blackmailed because rich profits awaited the buyer. Capital pays peace money rather than fight in the open for honest politics. Thus it is that every trust in the country to-day is in whole or in part a creation of dishonest commercialism in politics. The remedy is an aroused and intelligent public opinion.

Mr. Gladden insists that capital is offensive, not merely defensive. It bribes not because it must, but because it profits from corruption. The chief source of corruption is the public service corporation, which wishes its spoliation of the people legalized. As palliatives Mr. Gladden suggests publicity of accounts, prohibition of stock watering, the popular vote on all franchises. As an effectual remedy he proposes government ownership. Nor would he wait for civil service reform. Civil service will follow, not precede municipal ownership, because dishonest officials make more out of franchise companies than out of the city trust.

Mr. Hooker and Mr. Sikes urge as a remedy the indeterminate franchise or continuing control. "Franchise grants should not run for any definite period, should specifically reserve to the granting power the right not only of absolute regulation of service and charges, but of revocation at any time, and should insure the grantee against injury by providing for compensation in case of revocation; such compensation to be based upon the cost of duplication less depreciation, depreciation including loss of

availability in the plant from invention or otherwise." This would cause the grantee to rely solely upon the merits of the service as the means of insuring continuance. In justification of this reasoning, it is insisted that it is precisely in Washington and Boston, where there is no guaranty of definite duration for street railway franchises, that the most creditable development anywhere to be found in respect to facilities and their higher organization has taken place. Congress has provided for continuing control and optional municipal ownership of all franchises in Porto Rico. Mr. Sikes argues that the remedy proposed would surely enlist the public service corporations on the side of pure politics, for they would then demand a city council of judgment, integrity and fairness.

Mr. Wilder, editor of the *Wisconsin State Journal*, discussed the primary election law which is now before the Wisconsin legislature, and cited the experiments which have been made by other states. It is stated that election reforms must depend not upon the elimination of partisanship, but upon its control. This control must come through some system of direct voting, which will also make the primary as much an official state function as the election. Dr. Maltbie reinforces this argument by showing that parties are produced by permanent, not temporary factors; that party organizations are growing in all large cities in Europe as well as in America; that, furthermore, the union of national and local parties is universal and inevitable. Dr. Maltbie believes that independent municipal parties cannot solve the municipal problem, but that national parties must adopt municipal programs. We must direct our attention more towards men and motives than towards the form of organization. Thus we shall have not more independent parties but more independent voters. The following alterations in our governmental system are recommended: (1) Separate municipal from state and national elections; (2) Decrease the number of elective officers; (3) Facilitate independent nominations in order to induce the parties to consider the wishes of the independents before making nominations; (4) Perfect the party system; (5) Extend the referendum; (6) Centralize responsibility; (7) Eradicate the spoils idea.

Uniform Municipal Accounting was the last general subject. Mr. Baker, Associate Editor of *Engineering News*, showed that sixteen national and state organizations were working toward uniform statistics and recommending a uniform system to their correspondents. Mr. Henderson, State Examiner for Wyoming, told of the successful trial of state examination of public accounts in that state. Since 1892 the county expenditures have decreased from $412,000 to $295,000, a decrease equivalent to a levy of three mills on the dollar on the assessed property valuation. In 1892 only two out of twelve counties were on a cash basis. The discussion of these papers called forth valuable testimonies from various states (pp. 58–62) and led to the appointment of a "committee to give special consideration to the subject of municipal accounts." This committee will be welcomed by administrators as well as students. Owing to the method of appointment, the various municipal offices are held by men untrained to the scrutiny of statistical returns. They have not been taught to regard reports as aids to administration. Yet few officers are lacking in that professional pride which will respond to public comparisons by striving to approximate a universally recognized and uniform minimum standard of excellence in official reports.

Finally should be mentioned the paper by Mr. Foulke who advocates minority and proportional representation, and the abolition of the ward. The lines which divide men's opinions are not ward lines at all. They are differences of interests, of views, of convictions on matters of general policy, or differences of opinion regarding the integrity or qualifications of particular officials. Interests are to-day actually represented in city councils; their representation should be made ostensible. Anarchists with repre-

entation are no more dangerous to the state than anarchists without representation. The ward system limits the choice of candidates and consequently lowers the standard. Ward politics will disappear when the ward ceases to be the basis for city representation.

Several concrete propositions contained in the Proceedings may be expected to awaken general discussion and to invite application. They have all been successfully tested. Among them may be mentioned (1) Compensation to the secretary of the National Municipal League who plans and directs the valuable Conferences; (2) The substitution of the indeterminate for the limited or perpetual franchise; (3) The abolition of the ward; (4) Compulsory uniform public accounting with public examination; (5) State regulation of the primary, and facilitation of nominations.

Of far reaching importance also should be the investigations of the committee appointed "to ascertain the extent to which instruction in Municipal Government and its betterment is offered by American institutions of learning." Independent municipal organizations have hitherto encountered not only the opposition of organized national parties, but also the apathy of the citizen. To counteract these two factors, there is no recourse but painstaking education. At the present time it would seem that the various educational agents are not sufficiently enlisted in the movement to concentrate attention upon the responsibilities, opportunities and dignity of municipal citizenship. The support of the daily press is sporadic, while the various journals published by civic organizations circulate, for the most part, among allies rather than among possible recruits. In the schools, text-books in harmony with past political traditions cater to an interest in national government, to the partial, if not total exclusion of municipa problems. It is the purpose of the above mentioned inquiry to determine what attempts are now being made by institutions of learning as well as writers and publishers of text-books to disseminate information with reference to essentially municipal problems.

University of Pennsylvania. WILLIAM H. ALLEN.

TAMMANY HALL.

The History of Tammany Hall. By GUSTAVUS MYERS. Published by the author, 52 William St., New York City, 1900. 12mo, 357pp. Cloth, $1.50.

Long drudgery of research has been gone through by the author of these interesting pages. "Files of all the available newspapers from 1789 to the present time" (a task for purgatory), "state and city histories, biographies, sketches, essays, political pamphlets and broadsides," and finally "numberless dreary pages of the minutes and documents of the common council (which for the years previous to 1831 exist only in manuscript), journals and documents of the Senate and Assembly" and weary files of the records of ten other official bodies—all have been examined by him as if to prove what mortal man can suffer. The result, however, is compact and readable, full of valuable matter, but not too heavy nor detailed for the enquiring citizen who wants an accurate, impartial account of the Society that has ruled New York with few intervals since 1800.

Mr. Myers is always a historian, never a partisan. The facts he has unearthed are so eloquent that he wisely leaves them to speak for themselves. Conclusions and morals the reader can draw without more than an occasional hint from the narrator.

If any self-respecting member of Tammany Hall would but read this plain tale, he would be forced to retire from a body with so nefarious a history. From the beginning until now the record is one long story of deception, broken promises, fights,

hypocrisy and greed. It used to be thought that Tammany had an innocent infancy and became vicious and rowdy only in early manhood. The impression was inaccurate. Dishonor attaches to it from the reign of Aaron Burr, the first leader, down to the supremacy of Richard Croker. "During three years, culminating in 1809, a series of disclosures regarding the corruption of Tammany officials astounded the city. . . . In the resultant revelations many Tammany chiefs suffered." Several officers were convicted of peculation. But the worst disclosure affected the Society's founder, William Mooney. He was appointed "superintendent of the almshouse, at an annual recompense of $1,000 and the support of his family in the place, provided that this latter item should not amount to over $500." Mooney had a more exalted idea of how he and his family ought to live. He spent nearly $4,000 on himself and family in addition to his salary; he had taken from the city supplies about $1,000 worth of articles, and moreover had expended various sums for "trifles for Mrs. Mooney"—a term which survived for many years in local politics.

Samuel Swartwout, a Tammany leader, between 1830 and 1835 robbed the government of nearly $1,250,000. The community was so impressed with the size of this defalcation that a verb "to Swartwout" was coined, which remained in general use for many years thereafter. A little later Wm. M. Price, a lesser figure in Tammany, defaulted for $75,000. The next year "testimony was brought out tending to show that the police justices, by means of an understanding with policemen and jailers, extorted money from prisoners and shielded counterfeiters, thieves, street walkers and malefactors from arrest or conviction." A special committee in 1842 reported that dishonest office-holders had recently robbed the city of little short of $100,000. Contracts were let for over double the sum that responsible persons offered. Land belonging to the city was fraudulently sold and "convicts were allowed to escape from Blackwell's Island on condition that they voted as their keepers ordered them. Prisoners whose terms had expired were kept at the public expense until election day, to get their votes." The council of 1852 earned the expressive name of "The Forty Thieves." Wm. M. Tweed was one of its members and learned his lessons well. It was in this council that the fight over Wall Street ferry occurred, of which one alderman in the language of the City Hall, declared "it was the damnedst fight that was ever had in the common council; it cost them (one of the applicants) from $20,000 to $25,000." Similar evidence could be quoted to carry the shameful history through the hundred million dollar raid of Tweed and his fellow scoundrels down to the more carefully concealed and legalized methods of to-day.

It is a common delusion that Tammany has grown and flourished upon manhood suffrage and the admission of aliens. This volume shows that the organization was just as powerful and corrupt under a suffrage limited to propertied natives as it has been since. In fact, Tammany for many years was hostile to the extension of the suffrage and the entry of foreigners. Up to 1830, "though professing itself devoted to the welfare of the poor, it was essentially a middle-class institution." At first the Irish, now the rulers of the city, were bitter opponents of Tammany Hall and supporters of Clinton who had worked to reduce the naturalization period from fourteen to five years. When Tammany found popular opinion too strong to resist, the leaders veered and advocated the measures they had previously condemned. That has been their plan always. They have never formulated great measures and led the public mind; generally they have been too ignorant to understand statesmanship and too busy plundering to care for it. They fought the abolition of imprisonment for debt and tried to re-enact it when they thought the interest of the workingmen had cooled. Only at the last moment, when the Workingmen's party had polled heavily, did Tammany support a mechanics' lien law to protect the workmen against swindling or bankrupt contractors.

Tammany was the most persistent and vigorous opponent of the construction of the Erie canal, the great early example of state ownership that brought the trade of the rich lands of the middle west to New York city and established her commercial supremacy.

Tammany was hostile to the registration of voters for the prevention of ballot frauds, denouncing it as inquisitorial, tyrannical and unjust. Up to the firng on Fort Sumter, slavery had no stouter advocate in the South than Tammany in New York. "In the hall, Southern representatives spoke and spread broadcast their doctrines on every available occasion; however ultra their doctrines might be, the Wigwam audiences never missed applauding them enthusiastically."

The organization has regularly surpassed Pecksniff in its professions of virtue. No claims to saintliness could be too lofty for it to make. Time and again it has presented the spectacle of Satan rebuking sin. The Society's calls for meetings for a long time summoned the faithful to "recount to each other the deeds of our departed chiefs and warriors in order that it may stimulate us *to imitate them in whatever is virtuous and just.*" In a high-falutin' address to Jackson, full of the finest flowers of Hibernico-Tammany oratory, Wm. Mooney, fresh from providing "trifles for Mrs. Mooney," modestly claimed: "Sons of Liberty, here, sir, we guard the patriot flame—preserved by concord—its effulgence, in a blaze of glory, shall surround and accompany you to the temple of interminable fame and honor." Upon the revelation of some Whig frauds in 1838, Tammany with crocodile tears said in its address: "It is with shame that we record these dark transactions. . . We would, if we could, blot out their existence, for it brings disgrace on our whole country, and will make the enemies of civil freedom laugh with joy."

There has always been the closest union between the Tammany Society and the political organization. Though the Society was incorporated nominally for charitable purposes, nobody was deceived at the time. The sachems who control the building have always been able to influence nominations by the simple plan of shutting out any faction they disliked, and declaring the opposing faction to be "regular." Several royal rows with the accompaniment of smashed furniture and cracked skulls have shown the high worth attached by hostile sections within the organization to the right to use the Society's rooms and establish a claim to regularity. When nomination under the star has meant almost certain election, the control of the emblem by the "philantropic" sachems has been the most effective political power.

Since Tammany has rarely, if ever, originated progressive proposals and has generally fought them until they were near victory, since its history is as foul as a sewer and its hypocrisy as sickening as Chadband's, how has it contrived to maintain not only existence but supremacy? These valuable pages by Mr. Myers suggest the answer.

First, its opponents have often been no better than itself; the citizens were frequently offered only a choice of loeters. And, furthermore, the Whigs were generally united against the workmen while Tammany was shrewd enough to give way and, at any rate, to pretend friendliness, whenever the workmen showed they were in earnest. "This election (1834)," says our author, "demonstrated clearly that the propertied classes as a whole were combined against the laborers, mechanics, farmers and producing classes generally, and that they were as much concerned over the spoils of office as was the most rabid Tammany man." During the panic winter of 1837-8 a Whig alderman proposed to spend several million dollars for improvements that would "raise the price of every lot west of Broadway $5,000 at a jump." "Millions to benefit landowners and shippers, but not a dollar for the unemployed hungry!" exclaimed the Equal Rights men. They could find not much difference between the parties. "Both

sweated the people for their own private interests." When the Native Americans elected a mayor in 1844 on the promise of good police, clean streets, economical expenditure, and tax reduction, "the scramble for office continued as before" and a reaction of disgust with reformers set in.

After the downfall of Tweed the progressive party showed more sense. Mayor Havemeyer was careful in the distribution of revenue, the officials were of relatively high character, the schools were improved, the streets cleaned and the expenditures reduced. But—these buts have often revived Tammany—by slurring allusions to Kelly's humble origin and early occupation, he "threw the sympathy and support of the masses" on the Tammany side. More recent reform administrations have also been financially honest but out of touch with popular sentiment, especially with regard to the revival of the same puritanic laws that helped to overthrow the Native Americans fifty years before.

Often in this history, Tammany is seen distributing alms to the poor, letting fall the crumbs from the rich plunderers' table. True the doles were trifling compared with the loot; not even a tithe was passed on; Tammany was less generous than Robin Hood; but the tiny gifts have been productive of much good feeling. Starving men do not stop to reason; they ask no questions about where the food that fills them came from. Even to-day respectable people will tell that Tweed may have been a thief, but "he was good to the poor" (in 1870–1 he gave $50,000 to the needy in his ward), and in their simplicity they seem to think the "virtue" excuses the vice. Doubtless the distribution of the surplus of the last mayoralty election fund in charity is expected by Mr. Croker to yield a rich return; and "Tim" Sullivan's Christmas dinners in the Bowery pay him hundreds per cent.

Another reason for Tammany's permanence is the shrewdness with which it has bribed and often won the leaders of opposing parties. When disgraced and defeated, it has worn sackcloth and ashes and humbly offered its support to probity and honor. After the Tweed overthrow, the Wigwam nominated a member of the Committee of Seventy for mayor, and men of worth and unimpeachable character for other posts. As late as 1874, it was solid for Tilden as governor. In 1886, when the workmen were in revolt, Mr. Croker offered Henry George a nomination which was equivalent to an election; and, failing in this, he ran Mr. Hewitt as a representative of conservatism and order. While in 1897, to withstand the effect of the Lexow investigations, the Wigwam hunted vainly for several weeks to find a candidate of honor and ability. Always, however, prosperity has brought back nefarious practices.

"The devil was sick, the devil a monk would be;
The devil was well, the devil a monk was he."

Materialistic greed has been the chief, the most reliable force for holding the organization together. Its best opponent, civic patriotism is still young. As yet the social compunction of the richer classes has proved too new and ill-disciplined to withstand the brute force of the ward-heelers. But, now and again, this history shows that the masses will follow men of wealth and honor if only they will give evidence that they are really working for all the citizens, not for their own social class. When Bryant and Leggett, as editors of the *Evening Post*, advocated industrial and political reforms and opposed the exactions of the water, gas and ferry monopolists, they led the Equal Rights party to victory, and in 1837 drove the robbers from the seats of power. Only by following their example can their victory be repeated. In different forms the question of city monopolies is seen in these pages to have stirred the citizens continually. Always and naturally the plain people have been against the monopolists. But Tammany's enemies

have rarely, on this question, been the people's friends. Therefore the voters have refused to follow them. The present interest in municipal ownership is a continuation of an agitation that began in the first years of last century. If Tammany is allowed to pose as the sole friend of the masses against the corporations, no matter how hollow the pretension may be, it will win at elections. "Better possible friends than declared foes," the voters will say. But as soon as the educated and well-to-do range themselves for radical reforms, so soon as they prove they prefer the well-being of the masses to the pockets of the classes, the progress of the city to the enrichment of monopolists, they will find a force behind them that will trample Tammany under foot.

All citizens who are glad to see villainy exposed in its naked hideousness and have at heart the advancement of our city, owe a debt of gratitude to Mr. Myers for his painstaking investigation. They cannot discharge it better than by trying to give the volume a wide circulation.

New York City. JOHN MARTIN.

BIBLIOGRAPHICAL INDEX.

KEY TO ABBREVIATIONS.

BRITISH AND AMERICAN PERIODICALS.

American Architect, Boston	W	Am. Arch.
American Ecclesiastical Review, New York	M	Am. Ecc. R.
American Economic Association Publications, New York	B-M	Am. Econ. Assoc.
American Electrician, New York	M	Am. Elec.
American Federationist, Washington	M	Am. Fed.
American Gas Light Journal, New York	W	Am. Gas Light J.
American Historical Review, New York	Q	Am. Hist. R.
American Journal of Science, New Haven	Y	Am. J. Sci.
American Journal of Sociology, Chicago	Q	Am. J. Sociol.
American Law Review, St. Louis, Mo	M	Am. Law R.
American Monthly Review of Reviews, New York	M	Am. R. of Rs.
American Public Health Association, Concord, N. H	Q	Am. P. H. Assoc.
American Statistical Association Publications, Boston	Q	Am. Statis. Assoc.
Annals of the American Academy of Political and Social Science, Philadelphia	B-M	Ann. Am. Acad. Pol. Sci.
Architect, London	W	Arch.
Architectural Record, New York	Q	Arch. Rec.
Architectural Review, Boston	S-Q	Arch R.
Architecture and Building, New York	W	Arch. & Bull.
Arena, Boston	M	Arena.
Atlantic Monthly, Boston	M	Atlan.
Banker's Magazine, London	M	Bank. M. (L.)
Banker's Magazine, New York	M	Bank. M. (N. Y.)
Bibliotheca Sacra, Oberlin, O	Q	Bib. Sacra.
Blackwood's Magazine, Edinburgh	M	Blackw.
Board of Trade Journal, London	M	Bd. Trade J.
British Architect, London	W	Br. Arch.
Builder, London	W	Builder.
Bulletin of the Department of Labor, Washington	B-M	B. Dept. Labor.
Canadian Architect, Toronto	M	Can. Arch.
Canadian Electrical News, Toronto	M	Can. Elec. N.
Canadian Engineer, Montreal	M	Can. Eng.
Canadian Magazine, Toronto	M	Canadian M.
Cassell's Family Magazine, London	M	Cassell's.
Cassier's Magazine, New York	M	Cassier's.
Century, New York	M	Cent.
Chamber's Journal, Edinburgh	M	Chamber's.
Charities Review, New York	M	Char. R.
Charity Organization Review, London	M	Char. Or. R.
Chautauquan, Cleveland, O	M	Chaut.
City and State, Philadelphia	W	City & State.
City Record, Boston	W	City Rec.
Commons, The, Chicago	M	Commons.
Commonwealth, New York	W	Commonw.
Consular Reports, Washington	M	Cons. Rep.
Contemporary Review, London	M	Contemp.
Cornhill Magazine, London	M	Cornhill.
Cosmopolitan, New York	M	Cosmopol.
Dial, Chicago	S-W	Dial.
Direct Legislation Record, Newark, N. J	M	Dir. Leg. Rec.
Dublin Review, London	Q	Dub. R.
Eclectic Magazine, New York	M	Ecl. M.
Economic Journal, London	Q	Econ. J.
Economic Review, London	M	Econ. R.
Economist, Chicago	W	Economist.
Edinburgh Review, Edinburgh	Q	Ed. R.
Education, Boston	M	Educa.
Educational Review, London	M	Educa. R. (London.)
Educational Review, New York	M	Educa. R. (N. Y.)
Electrical Engineer, London	W	Elec. Eng. (L.)
Electrical Engineering, Chicago	M	Elec. Engng.
Electrical Review, New York	W	Elec. R.
Electrical World and Electrical Engineer, New York	W	Elec. W. & E.
Electrician, London	W	Elec'n.
Electricity, London	W	Elec'y (L.)
Engineer, The, London	W	Eng.

Engineering, London	W	Engng.
Engineering Magazine, New York	M	Engng. M.
Engineering News, New York	W	Engng. N.
Engineering Record, New York	W	Engng. Rec.
English Historical Review, London	Q	Eng. Hist. R.
Fire and Water, New York	W	Fire & W.
Fortnightly Review, London	M	Fortn.
Forum, New York	M	Forum.
Gas World, London	W	Gas W.
Green Bag, Boston	M	Green B.
Gunton's Magazine, New York	M	Gunton's.
Harper's Magazine, New York	M	Harper's M.
Harper's Weekly, New York	W	Hrprs. Wkly.
Illinois Society of Engineers and Surveyors, Peoria		Ill. Soc. Eng.
Independent, New York	M	Ind.
Indian and Eastern Engineer, Calcutta	W	Ind. & East. Eng.
Indian Engineering, Calcutta	W	Ind. Engng.
International Review, New York	M	Internat. R.
Johns Hopkins University Studies in History, etc., Baltimore		J. H. Univ. Studies.
Journal of the Association of Engineering Societies, Philadelphia	M	J. Assoc. Engng. Soc.
Journal of the Department of Labor, Wellington, New Zealand	M	J. Dept. Labor.
Journal of Finance, London	M	J. Finance.
Journal of the Franklin Institute, Philadelphia	M	J. Frankl. Inst.
Journal of Gas Lighting, London	W	J. Gas Light.
Journal of the New England Water-Works Ass'n, New London, Conn.	Q	J. N. E. W. W. Assoc.
Journal of Political Economy, Chicago	Q	J. P. E.
Journal of the Royal Statistical Society, London	Q	J. R. Stat. Soc.
Journal of the Sanitary Institute	M	J. San. Inst.
Journal of Social Science, Boston	Y	J. Soc. Sci.
Journal of the Society of Arts, London	W	J. Soc. Arts.
Journal of the Society of Comparative Legislation, London	Q	J. Soc. Comp. Leg.
Journal of the Western Society of Engineers, Chicago	B-M	J. W. Soc. Eng.
Kindergarten Magazine, Chicago	M	Kindergarten M.
Labor Bulletin of the Commonwealth of Massachusetts, Boston	Q	Labor Bulletin, Mass.
Law Magazine and Review, London	M	Law M. & R.
Leslie's Weekly, New York	W	Leslie's Wkly.
Library Journal, New York	M	Lib. J.
Lippincott's Magazine, Philadelphia	M	Lippinc.
Literary Digest, New York	W	Lit. Dig.
Longman's Magazine, London	M	Longm.
Macmillan's Magazine, London	M	Macmil.
McClure's Magazine, New York	M	McClure's.
Merchant's Association Review, San Francisco, Cal	M	Mchts. Assoc. R.
Municipal Engineering, Indianapolis, Indiana	M	Mun. Engng.
Municipal Journal and Engineer, New York	M	Mun. J. & Eng.
Municipal Journal and London, London	W	Mun. J. & London.
Municipal and Railway Record, New York	M	Mun. & Ry. Rec.
Municipal World, St. Thomas, Ont	M	Mun. World.
Munsey's Magazine, New York	M	Munsey's.
Nation, New York	W	Nation.
National Review, London	M	National R.
New Century Review, London	M	New Cent. R.
New England Magazine, Boston	M	New Eng. M.
New Review, London	M	New R.
New York Education, Albany	M	N. Y. Educa.
Nineteenth Century, London	M	19th Cent.
North American Review, New York	M	No. Am.
Open Church, New York	Q	Open Church.
Open Court, Chicago	M	Open Court.
Our Country, New York	M	Our Country.
Our Day, Boston	M	Our Day.
Outlook, New York	W	Outlook.
Overland Monthly, San Francisco, Cal	M	Overland.
Park and Cemetery, Chicago	W	Park & Cem.
Political Science Quarterly, New York	Q	Pol. Sci. Q.
Popular Science Monthly, New York	M	Pop. Sci. Mo.
Proceedings of the Engineers' Club, Philadelphia	Q	Pro. Eng. C.
Progressive Age, New York	W	Prog. Age.
Public Opinion, New York	W	Pub. Opin.
Publications of the Southern Historical Association, Washington		Pub. So. Hist. Ass'n.
Quarterly Journal of Economics, Cambridge, Mass	Q	Q. J. E.
Quarterly Review, London	Q	Quar. R.
Railroad Gazette, New York	W	Railroad Gaz.
Railway World, London	M	Ry. World.
Real Estate Record and Guide, New York	W	Real Estate Rec. & G.
Review of Reviews, London	M	R. of Rs. (Eng.)
Sanitarian, Brooklyn	M	Sanitarian.
Sanitary Journal, Glasgow	M	San. J.
Sanitary Record, London	W	San. Rec.
Saturday Review, London	W	Sat. R.
Scientific American, New York	W	Sci. Am.
Scientific American Supplement, New York	W	Sci. Am. Sup.
Scottish Review, London	Q	Scottish R.

Scribner's Magazine, New York.....M	Scribner's.
Self-Culture, Akron, Ohio.....M	Self-Cult.
Spectator, London.....W	Spec.
Strand Magazine, London.....M	Strand.
Street Railway Journal, New York.....M	St. Ry. J.
Street Railway Review, Chicago.....M	St. Ry. R.
Transactions of the American Institute of Electrical Engineers, New York.....M	Trans. Am. Inst. Elec. Eng.
Transactions of the American Society of Civil Engineers, New York.....M	Trans. Am. Soc. Civ. Engrs.
Westminster Review London.....M	Westm.
Yale Review, New Haven, Conn.....Q	Yale R.

FOREIGN PERIODICALS.

Allgemeines Statistisches Archiv, Tübingen.....S-Y	All. Stat. Ar.
Annales D'Hygiene Publique, Paris.....M	Ann. D'Hyg. Pub.
Annales des Sciences Politiques, Paris.....M	Ann. Sci. Pol.
Annales des Travaux Publics de Belgique, Brussels.....Bi-M	Ann. Travaux Pub.
Arbeiterfreund, Berlin.....Q	Arbeit.
Archiv für Eisenbahnwesen, Berlin.....B-M	Ar. Eisenbahn.
Archiv für Oeffentliches Recht, Freiberg.....Q	Ar. Oef. Rt.
Archiv für Soziale Gesetzgebung und Statistik, Berlin.....B-M	Ar. Soz. Gesetz. Stat.
Bibliotheque Universelle, Brussels.....M	Bib. Univ.
Deutsche Bauzeitung, Berlin.....B-W	Deut. Bau.
Deutsche Revue, Stuttgart.....M	Deut. R.
Deutsche Rundschau, Berlin.....M	Deut. Rund.
Devenir Social, Paris.....M	Dev. Soc.
Elektrotechnische Zeitschrift, Berlin.....M	Elek. Zeit.
Espana Moderna, Madrid.....M	Esp. Mod.
Finanz-Archiv, Stuttgart.....S-Y	Finanz-Ar.
Génie Civil, Paris.....W	Génie Civil.
Gesundheits-Ingenieur, Munich.....B-W	Gesund.-Ing.
Giornale Degli Economisti, Roma.....M	G. Degli Econ.
Historische Vierteljahrschrift, Leipzig.....Q	Hist. Vier.
Historische Zeitschrift, Munich and Leipzig.....Q	Hist. Zeit.
Historisches Jahrbuch, Munich.....Q	Hist. Jr.
Jahrbuch für Gesetzgebung Verwaltung und Volkswirtschaft in Deutschen Reich, Leipzig.....Q	Jr. Gesetz. Ver. Volks.
Jahrbücher für Nationalokonomie und Statistik, Jena.....Q	Jr. Nat. Stat.
Journal des Économistes, Paris.....M	J. Economistes.
Nouvelle Revue, Paris.....S-M	Nouvelle R.
Nouvelle Revue Historique, Paris.....B-M	N. R. Hist.
Nuova Antologia, Rome.....S-M	Nuova Ant.
Preussische Jahrbücher, Berlin.....M	Preus. Jr.
Reforma Sociale, Turin.....M	Reforma Soc.
Réforme Sociale, Paris.....M	Ref. Soc.
Revue Bleue, Paris.....W	R. Bleue.
Revue de Deux Mondes, Paris.....S-M	R. Mondes.
Revue de Droit Publique, Paris.....B-M	R. Droit Pub.
Revue D'Économie Politique, Paris.....M	R. Econ. Pol.
Revue Generale, Brussels.....M	R. Gen.
Revue Internationale de Sociologie, Paris.....M	R. Int. Sociol.
Revue de Paris, Paris.....S-M	R. Paris.
Revue Pédagogique, Paris.....M	R. Ped.
Revue Pénitentiaire, Paris.....B-M	R. Pen.
Revue Politique et Parliamentaire, Paris.....M	R. Pol. e. Par.
Revue des Questions Historiques, Paris.....M	R. Ques. Hist.
Revue des Questions Scientifiques, Brussels.....W	R. Ques. Sci.
Revue des Revues, Paris.....S-M	R. Revs.
Revue Scientifique, Paris.....W	R. Sci.
Revue Socialiste, Paris.....M	R. Soc.
Revue Technique, Paris.....B-W	R. Technique.
Revue du Travail, Brussels.....M	R. Travail.
Rivista Internacional, Madrid.....M	Riv. Inter.
Rivista D'Italia, Roma.....M	Riv. D'It.
Rivista Italiana di Sociologia, Roma.....B-M	Riv. It. Sociol.
Schweizerische Bauzeitung, Zürich.....W	Schweiz. Ban.
Scienza Sociale, Milan.....B-M	Sci. Soc.
Staats-und Socialwissenschaftliche Forschungen, Leipzig.....Q	Staats-Soc. Forschungen.
Staats-und Völkerrechtliche Abhandlungen, Leipzig.....Q	Staats-Völk. Abhand.
Statistik Tidskrift, Stockholm.....Q	Stat. Tid.
Vierteljahrschrift für Staats-und Volkswirtschaft, Leipzig.....Q	Vier. Staats. Volks.
Zeitschrift für die Gesamte Staatswissenschaft, Tübingen.....Q	Zeit. Staatswissen.
Zeitschrift für Oesterreichischen Ingenieur-und Architekten-Vereines, Vienna.....W	Zeit. Ing.-Arch-Ver.
Zeitschrift für Social und Wirtschaftsgeschichte, Weimar.....Q	Zeit. Soc. Wirth.
Zeitschrift für Socialwissenschaft, Berlin.....M	Zeit. Socialwissen.
Zeitschrift für Versicherungs-Recht und Wissenschaften, Strassburg.....Q	Zeit. Ver. Recht. Wissen.
Zeitschrift für Volkswirtschaft, Socialpolitik und Verwaltung, Vienna.....Q	Zeit. Volks. Soc. u. Ver.

INDEX FOR THE QUARTER, SEPTEMBER—DECEMBER, 1900.

(NOTE.—The following subject index is intended to continue the work began in the first (March, 1897) issue of MUNICIPAL AFFAIRS, which was entirely devoted to a Bibliography of Municipal Administration and City Conditions. In subsequent numbers, the Index was made complete to September 1st. So far as possible all books, reports, pamphlets and magazine articles of interest to students of city governments which have appeared during the past three months, September to December, 1900, are included in the following list. Future numbers of MUNICIPAL AFFAIRS will contain similar indices covering the literature of each preceding quarter.)

Acetylene. (See **Lighting.**)

"**Advertising** and Advertisers." Warner, John De Witt Warner. Mun. Aff. 4:772 (Dec. 1900.)

Albany, N. Y.

"Water Filtration at Albany, Results of." MacHarg, Martin. Engng. Rec. 42:516 (Dec. 1, 1900.)

Architecture. (See **Building Laws.**)

Asphalt Paving. (See **Pavements, Paving.**)

Assessments, Special. (See **Finance, Taxation.**)

"Assessments for Local Improvements." Weakley, John B., Jr. (Pp. 41-45 in "Proceedings of the 3rd Annual Convention of the League of American Municipalities, 1899." 8vo, 148 pp. Paper.)

California, Special Assessments in. (See **California.**)

"Municipal Sewerage Systems and Assessments." Bouton, George T. Engng. Rec. 42:268 (Sept. 22, 1900.)

"Special Assessments for City Work." Johnson, J. A. (Pp. 37-41 in "Proceedings of the 3rd Annual Convention of the League of American Municipalities, 1899." 8vo, 148 pp. Paper.)

"The Theory and Practice of Laying Assessments for Benefit." Lewis, N. P. Public Policy 3:249 (Dec. 1, 1900.)

Baltimore, Md.

"Police and Fire Departments of Baltimore, Reform in the." Good Government 18:6 (July-Oct. 1900.)

Baths, Lavatories and Wash-Houses, Public.

New York, Public Baths in. (See **New York.**)

St. Paul, Baths in. (See **St. Paul.**)

Berlin.

"City Council of Berlin, The." James, Edmund J. Am. J. Sociol. 6:407 (Nov. 1900.)

"Elevated Road, The Berlin Electric." St. Ry. J. 16:960 (Oct. 13, 1900.)

"Housing of the Working Classes in Berlin." Surveyor 18:566 (Nov. 16, 1900.)

Municipal Railway, Electric Driving on the Berlin. ("Der Elektrische Betrieb auf der Berliner Stadt- und Ringbahn.") Glaser's Annalen (Aug. 15, 1900.)

Sewage Works at Berlin, Municipal. ("Die Stadtischen Kanalisationwerke Berlins.") Gesund. Ing. 23:213 (July 15, 1900.)

Bern, Switz.

Finances and Population of Bern in the 15th Century. ("Finanzwesen und Bevölkerung der Stadt Bern im 15 Jahrhundert.") Schindler, K. Zeitschrift für Schweizerische Statistik, 1900.

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"Electric Railway in Birmingham, The." Halstead, Marshal. Elec. R. 37:284 (Sept. 5, 1900); Cons. Rep. 64:311 (Nov. 1900.)

"How Birmingham Keeps Healthy." Mun. J. 9:905 (Nov. 16, 1900.)

"Water Works, The Birmingham New." Crespi, Alfred J. H. New Cent. R. 8:368 (Nov. 1900.)

——. "The Construction of the Elan Aqueduct, Birmingham." Lapworth, Herbert. Engng. Rec. 42:292 (Sept. 29, 1900.)

"Bombay, The Water Supply of." San. Rec. 26:299 (Oct. 5, 1900.)

Boston, Mass.
"Municipal Printing in Boston." Chase, Harvey S. Mun. Aff. 4: 774 (Dec. 1900.)
"Public Work in 1900, Boston." Mun. Engng. 19:381 (Dec. 1900.)
Subway. Results of Experience with the Boston. ("Erfolge und Erfahrungen mit der Boston Unterpflasterbahn.") v. Emperger, Fritz. Zeitschr. Oesterr. Ing. u. Arch. Ver. (Oct. 1900.)
"Water-Works, The Chestnut Hill Pumping Station of the Metropolitan." Flinn, Alfred D. Engng. Rec. 42:345 (Oct. 13, 1900); 42:397 (Oct. 20, 1900); 42:430 (Oct. 27, 1900.)
——. "The Wachusett Dam for the Metropolitan Water Supply, Boston, Mass." Flinn, Alfred D. Engng. News 44:174 (Sept. 13, 1900.)
—— ——. Engng. Rec. 42:218 (Sept. 8, 1900); 42:249 (Sept. 15, 1900.)

Bradford, Eng.
"Garbage Cremation at Bradford, England." McTaggart, John. Engng. Rec. 42:297 (Sept. 1900.)
——. "The Disposal of House Refuse in Bradford." McTaggart, John. Elec. R. (Lond.) Sept. 14, 1900; Surveyor 18:219 (Sept. 14, 1900); San. Rec. 26:247 (Sept. 21, 1900; Engng. (Lond.) 70:383 (Sept. 21, 1900.)

"Sewage, Treatment of dford." San. Rec. 26:299 (Oct. 5, 1900); Surveyor 18:297 (Oct. 5, 1900.)
"Water Works, The Bradford." Watson, James. Engng. (Lond.) 70:349 (Sept. 14, 1900.)

Brighton, Eng.
Tramways. "Brighton's Latest Venture." Mun. J. 9:397 (Sept. 7, 1900.)

Bristol, Eng.
"Tramway System, Bristol." Ty. & Ry. W. 9:563 (Nov. 3, 1900.)

Brooklyn, N. Y. (See under New York.)

Building Laws and Regulations.
"The Heights of Tall Buildings." Engng. Rec. 42:217 (Sept. 8, 1900.)

Burlington, Iowa.
"The New Sewer Outfall at Burlington, Iowa." Mun. Engng. 19:267 (Oct. 1900.)

Bury, Eng.
"Housing Problem at Bury, The." San. Rec. 26:302 (Sept. 7, 1900.)

"Cairo [Egypt] Electric Tramways, The." Ry. World 8:345 (July 6, 1899.)

California.
"Proposed Act to Provide for Local Improvements within Municipalities." Cal. Mun. 2:87 (Nov. 1900.)

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Cities, City. (See also Child Problem in Cities and Pauperism.)

Chicago, Ills.
"Drainage Canal a Joliet, Power Development of the." W. Elec'n, Sept. 22, 1900.
"Gas War, Chicago." Prog. Age 18:471 (Nov. 1, 1900.)
"Report of the Street Railway Commission of the City Council of the City of Chicago." Sikes, George C., Secretary. City Council, Chicago, 1900. 8vo, 136 pp. Paper.
"Saloon in Chicago, The." Melendy, Royal L. Am. J. Sociol, 6:639 (Nov. 1900.)
——. ("Social Functions of the Saloon in Chicago." Melendy, Royal Loren. Commons no. 62, p. 1 (Nov. 1900.)

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"Social Settlements in Chicago." Embree, Francis Buckley. Gunton's 19:458 (Nov. 1900.)
"Street Railway Policy, Questions of." Maltbie, Milo Roy. Public Policy 3:347 (Dec. 1, 1900.)
"Water Supply Tunnels of Chicago, The." Engng. News 44:259 (Oct. 18, 1900); 44:308 (Nov. 8, 1900.)

"Cleveland's Garbage." Mun. J. & Eng. 9:187 (Dec. 1900.)

"Concord [Mass.] Sewage Pumping and Electric Station, The." Engng. Rec. 42:320 (Oct. 6, 1900.)

"Constantinople." Hutton, William Holden. New York, The Macmillan Co., 1900. 8vo, 341 pp. Cloth, $1.50.

"Copenhagen, Small Gardens for Tenement Dwellers in." Leeb, Morris. Char. R. 10:146 (Dec. 1900.)

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"The Contract System." Perry, George R. (Pp. 113-114 in "Proceedings of the 3rd Annual Convention of the League of American Municipalities, 1899." 8vo, 148 pp. Paper.)

Denver, Colo.
"Sedimentation Tanks with Numerous Circular Overflow Weirs; Denver Union Water Co." Engng. N. 44:333 (Nov. 15, 1900.)

Detroit, Mich.
"Public Work, Methods in Detroit." Mun. Engng. 19:324 (Nov. 1900.)

Direct Legislation. (See also **Referendum.**)
"Arguments and Authorities for Direct Legislation or the Initiative and the Referendum." Dir. Leg. Rec. vol. 7, no. 4 (Nov. 1900.)

"Edinburgh, The Housing Problem in." Mun. J. 9:701 (Sept. 7, 1900.)

Electric Lighting. (See **Lighting.**)

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"Electric Currents and Gas and Water Mains." J. Gas Light. 76:849 (Oct. 2, 1900.)
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Elevated Railways. (See **Street Railways.**)

England. (See **Great Britain.**)

Excise, Sunday Closing, etc. (See **Saloon Problem.**)

Filtration of Water Supply. (See **Water Supplies of Cities.**)

Finance. (See also **Taxation.**)
Bern, Switz., Finances of. (See **Berne.**)
"Examinations of Public Accounts." Henderson, Harry B. Public Policy 3:213 (Oct. 6, 1900.)
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"Uniform Municipal Accounting." Baker, M. N. Public Policy 3:186 (Sept. 29, 1900.)
——. "Uniform Municipal Accounts and Reports." Baker, M. N. Public Policy 3:183 (Sept. 22, 1900.)
Wisconsin, Uniform Accounting in. (See **Wisconsin.**)

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"Automatic Fire Alarm Systems." Bargher, Charles. City Govt. 9:128 (Nov. 1900.)

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"Fire Streams and their Handling." City Govt. 9:101 (Oct. 1900.)

New York, Fire Department of. (See **New York.**)

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"The Story of Florence." Gardner, Edmund G. London, J. M. Dent & Co.; New York, Macmillan, 1900. 16mo, 426 pp. Cloth, $1.75.

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"Electric Railway Practice in France." Connett, A. N. St. Ry. J. 16:827 (Oct. 13, 1900.)

Public Assistance in France from 1889 to 1900. ("L'Assistance Publique en France de 1889 à 1900.") Monod, Henri. R. Gén. D'Administration 69:126 (Oct. 1900.)

"Socialists in French Municipalities." Kerr, Charles H.; and Simons, A. M. Chicago, Charles H. Kerr & Co., 1900. 16mo, 31 pp. Paper, 5 cents.

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Fuel Gas. (See **Lighting.**)

Garbage Disposal. (See also **Sewage Disposal.**)

"A Plea for the More Comprehensive dy of Garbage Disposal." Woodward, W. C. (Pp. 19-32 in "Proceedings of the 3rd Annual Convention of the League of American Municipalities, 1899." 8vo, 143 pp. Paper.)

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"How Properly to Collect and Dispose of Garbage." Scherer, H. P. Mun. Engng. 19:331 (Nov. 1900); Cal. Mun. 3:116 (Dec. 1900.)

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Paris, Garbage Disposal in. (See **Paris.**)

"The Disposal of Towns' Refuse." Elec. R. (Lond.) Sept. 21, 1900.

Toronto, Garbage Disposal in. (See **Toronto.**)

Gas. (See **Lighting.**)

"**Gateshead [Eng.]**, Overcrowded." Mun. J. 9:741 (Sept. 21, 1900.)

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——. "The Light of Glasgow." Mun. J. 9:737 (Sept. 21, 1900.)

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"Electricity in Small Towns." Boot, Horace. Mun. J. 9:733 (Oct. 5, 1900.)
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——. "Workmen's Dwellings as they are." Fireside Nov. 1900.
"Municipal Finance and Municipal Enterprise." Fowler, Sir Henry Hartly. J. Royal Stat. Soc. 63:383 (Sept. 1900.)
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EDGAR J. LEVEY.—Born in New York city, November 4, 1868. Graduated from Columbia College in 1883 and from the Columbia Law School in 1886, in which year he was admitted to the bar. Practiced law until 1891, when he was appointed secretary to the Comptroller in the Finance Department of New York city. Appointed Assistant Deputy Comptroller in 1898 and Deputy Comptroller in 1899. In 1900 was appointed by Governor Roosevelt one of the commissioners to revise the Greater New York charter. Since 1896 has acted as secretary of the Sinking Fund Commission. Is generally recognized as an authority upon municipal finance.

MILO ROY MALTBIE.—Born near Hinckley Illinois. Received his early education in the public schools and the preparatory department of Upper Iowa University, graduating from the college in 1892. Spent one year in the graduate school of the Northwestern University, devoting particular attention to municipal government. Was awarded, in 1893, the Dewey prize of $100 in Political and Social Science, and the Cushing prize of $100 in Municipal Government for a dissertation upon *The City Government of Chicago*. From 1893 to 1895 taught higher mathematics and economics in Mount Morris College, Illinois, leaving there to accept the university fellowship in administrative law at Columbia University. Received the degree of Ph. D. from the latter institution in 1897, having given particular attention to administrative law, public law, economics and municipal government. After graduation, was chosen secretary of the Reform Club Committee on Municipal Administration and editor of MUNICIPAL AFFAIRS. Spent the summer of 1899 studying municipal problems and conditions in Europe. Prize lecturer upon municipal government in Columbia University, 1900. Has written *English Local Government of To-Day; Central Administrative Control in England; The English Local Government Board; Municipal Functions; A Study of the Development, Scope and Tendency of Municipal Socialism;* and several papers upon other municipal subjects appearing in various magazines.

GEORGE MCANENY.—Born in Greenville, N. J., December 24, 1869. Educated in the public schools. From 1885 to 1892 engaged in journalistic work, contributing during the latter part of this period to *Harper's Weekly* and to the special departments of the principal dailies in New York and near-by cities. Was appointed in April, 1892, assistant secretary of the National Civil Service Reform League and of the Civil Service Reform Association of New York. In 1894 was made secretary and executive officer both of the League and the Association, which dual position he still holds. In 1895, during the municipal campaign resulting in the election of Mayor Strong, served as a member of the civil service committee of the Committee of Seventy. Is editor of *Good Government* and continues to contribute occasionally to the magazines and other publications. Has been a member of the municipal affairs committee of the City Club, is a member of the executive committee and one of the founders of the Armstrong Association devoted to the promotion of Southern industrial education, and is a member and district officer of the Citizens' Union.

CHARLES A. MEADE.—Born in Missouri, 1873. Resident of New York state, Dutchess County, since 1877. Studied at Williston Seminary, Northampton, Mass., from 1887 to 1890. Graduated from the Massachusetts Institute of Technology, Bos-

ton, in 1894 (Department of Civil Engineering). Began work with Col. George E. Waring, Jr., in November of the same year. Appointed superintendent of final disposition by Colonel Waring in March, 1895, which position he held until February 26, 1901.

WILLIAM HENRY MAXWELL.—Born in Ireland, March 5, 1852. Graduated from Queen's University, Ireland 1872, receiving the degree of M.A. in 1874, and the honorary degree of doctor of philosophy from St. Lawrence University. Is city superintendent of schools in New York City. Has written several text books on English grammar; has edited *Pope's Homer's Iliad* and contributed frequently to educational and literary magazines.

WILLIAM F. KING.—Is a prominent merchant of the City of New York, where he was born in 1850. After a common school education, at the age of sixteen entered the entered the employ of a wholesale dry goods house, where he displayed such signal ability that within five years he became a member of the firm. Has maintained his first business relation unbroken during a period of thirty-four years. Was made president of the Merchants' Association of New York in 1897, formed to oppose certain railroad discriminations injurious to the business interests of the city. Under his direction the Association developed into a permanent working organization, adapted to prompt action in public matters whenever the interests of business men and property owners need proper recognition from public officials and law makers. The more notable achievements have been the securing of proper post office facilities for New York, the securing of enlarged ship channels and, above all, the overthrow of the Ramapo scheme and the passage of legislation to amply protect this city's future water-supply.

JULIUS M. MAYER.—Born September 5th, 1865, in New York city. Was educated at Grammar School 68, and graduated from the College of the City of New York in 1884 and the Columbia Law School in 1886. Admitted to the bar in this city in 1886, and has had a large experience in questions relating to the building law. In 1898 was the Republican candidate for justice of the District Court of the Ninth Judicial District of New York city. In 1895 was appointed attorney to the excise board, holding that office until May 1st, 1896, when this with other excise boards was legislated out of office by the enactment of the Raines law. In 1897-8 was attorney to the Department of Buildings. Was counsel to the Reinhard investigating committee appointed by the Legislature to investigate the condition of labor in the sweat shops and the employment of women and children in manufacturing and other establishments in New York city. Important recommendations were made to the Legislature, many of which are now included in the Labor Law.

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